1979

遠洋다랑이 延繩漁業 漁獲統計 資料集 및 漁場図

ANNUAL REPORT OF CATCH AND EFFORT STATISTICS AND FISHING GROUNDS ON KOREAN TUNA LONGLINE FISHERY

1979

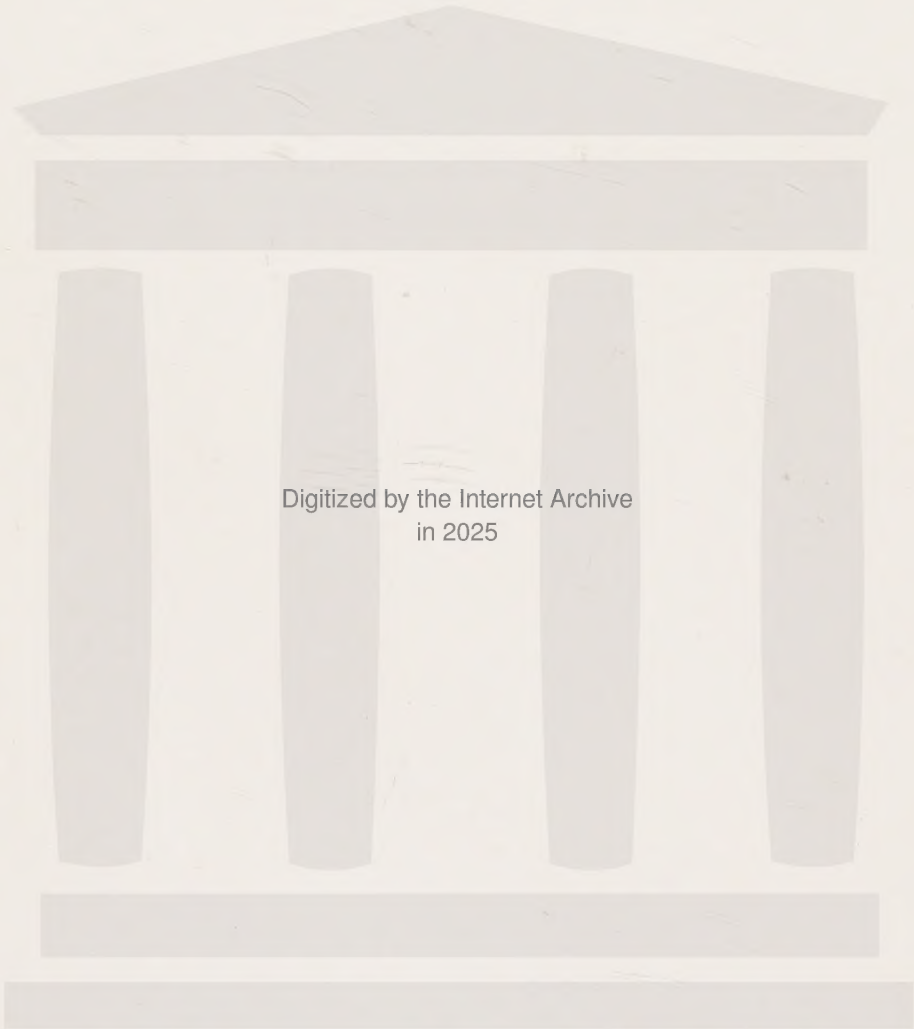
MAY 5 1982
National Marine Fisheries Service
2570 Dole Street
Honolulu, Hawaii

國立水産振興院

FISHERIES RESEARCH & DEVELOPMENT AGENCY

BUSAN, KOREA

December, 1981



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국민교육헌장

우리는 민족중흥의 역사적 사명을 띠고 이 땅에 태어났다. 조상의 빛난 얼을 오늘에 되살려, 안으로 자주 독립의 자세를 확립하고, 밖으로 인류 공영에 이바지 할 때다. 이에, 우리의 나아갈 바를 밝혀 교육의 지표로 삼는다.

성실한 마음과 튼튼한 몸으로, 학문과 기술을 배우고 익히며, 타고난 저마다의 소질을 계발하고 우리의 처지를 약진의 발판으로 삼아, 창조의 힘과 개척의 정신을 기른다. 공익과 질서를 앞세우며 능률과 실질을 숭상하고, 경애와 신의에 뿌리박은 상부 상조의 전통을 이어받아, 명랑하고 따뜻한 협동정신을 북돋운다. 우리의 창의와 협력을 바탕으로 나라가 발전하며 나라의 융성이 나의 발전의 근본임을 깨달아, 자유와 권리에 따르는 책임과 의무를 다하며, 스스로 국가 건설에 참여하고 봉사하는 국민 정신을 드높인다.

반공 민주정신에 투철한 애국애족이 우리의 삶의 길이며, 자유세계의 이상을 실현하는 기반이다. 길이 후손에 물려줄 영광된 통일 조국의 앞날을 내다보며, 신념과 긍지를 지닌 근면한 국민으로서 민족의 슬기를 모아 줄기찬 노력으로, 새 역사를 창조하자.

머 리 말

우리나라 遠洋漁業은 1957年 印度洋에서 다랑이 延繩漁業 試驗操業을 계기로하여 1962年 太平洋, 1964年 大西洋에 出漁하므로서 急激한 伸張을 이룩하여 왔읍니다. 그러나 現今의 海洋을 둘러싼 國際水産動向은 沿岸國들의 排他的 200海里 經濟水域 設定과 漁業規制의 强化 및 國際水産機構에 의한 資源管理擴大 趨勢等으로 既存 漁場範圍가 점차 縮小되고 있으며, 이런 趨勢는 1950年代 UN 海洋法會議 以後 더욱 高潮되어 1981年 現在 136個 沿岸國중 87個國이 각종 形態로 管轄水域을 擴大 實施하고 있고 나머지 沿岸國들도 곧 宣布할 것으로 豫想됩니다. 한편 國內的으로는 輸出産業으로서 高度의 成長을 維持해 왔던 다랑이 漁業이 계속되는 油價引上과 魚價昏迷等으로 인하여 水産物生産의 伸張에도 적지않은 影響이 豫想되고 있읍니다.

따라서 國立水産振興院에서는 1975 ~ 1978年間 遠洋다랑이 漁獲統計資料集 및 漁場図 發刊에 이어 1979年 三大洋에서 다랑이 漁船으로 부터 蒐集된 資料를 整理하여 신속 正確한 漁場情報를 漁民諸位께 提供하므로서 最小의 努力과 經費로서 보다 많은 漁獲에 의한 所得增大를 뒷받침함과 동시에 더욱 効果的인 漁業活動으로 다랑이 漁業發展에 일익을 담당하게 하고 또한 다랑이 漁業資源에 관한 國內 및 國際的 管理의 基礎資料를 마련하고자 本 資料集 및 漁場図를 發刊하게 되었읍니다.

끝으로 본 책자가 發刊되기까지 資料提出에 協助해 주신 遠洋漁業者諸位께 깊은 감사를 드리며 資料의 整理分析 및 編輯에 수고한 當院遠洋資源調査科 職員 일동의 勞苦을 치하하는 바입니다.

1981年 12月 日

国立水産振興院長 李 義 秀

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本 資料集 및 漁場図의 作成 및 編輯에 関係된 研究者

Edited by

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Ⅰ. 資料 및 方法

本 資料集에 收錄된 資料는 1979 年度 3 大洋에서 韓國 다랑이 延繩漁船으로 부터 蒐集된 漁獲實績報告書를 基礎로 하여 다음과 같이 作成했다.

1. 漁獲統計 資料集

가. 蒐集된 資料는 各漁船의 操業位置에 따라 經緯度 5°×5° 간격으로 區分 集計 하였다.

나. 漁獲實績報告書에 記錄된 資料는 G.G.Weight (gutted, gilled, fin-off)이므로 當院에서 調査한 G.G.Weight와 Round Weight (全重量) 관계에서 全重量으로 換算했다.

다. 海區別 (5°×5°) 漁場分布圖에서 努力量은 사용된 全 낚시數를, 魚種別 密度分布는 CPUE로서 表示했으며 計算方法은 $CPUE = \frac{\text{漁獲尾數}}{\text{사용낚시數}} \times 100$ 과 같다.

2. 漁 場 図

가. 漁場分布図에서는 調査期間 동안 漁獲對象種 全體에 대한 年別, 分期別, 月別로 區分한 CPUE와 努力量을 表示했고, 魚種別로는 重要種인 날개다랑이, 황다랑이, 눈다랑이의 順으로 上記 區分한 시기와 같이 각각 나타내었다.

나. 漁場圖에 表示한 CPUE 및 努力量의 範例는 각각 다음과 같다.

單位努力當 漁獲量

Catch Per Unit of Effort

(單位 : 100 낚시당 마리수)

Unit:No. of fish per 100 hooks

o	0.00	—	0.49
•	0.50	—	0.99
○	1.00	—	1.99
◎	2.00	—	2.99
◉	3.00	—	4.99
●	5.00 이상		

努 力 量

Efforts

(사용낚시수)

No. of hooks used

o	5,000 이하		
•	5,000	—	9,999
○	10,000	—	49,999
◎	50,000	—	99,999
◉	100,000	—	149,999
●	150,000 이상		

Ⅱ. 漁獲實績 報告書 蒐集 및 集計

1. 報告書 蒐集現況

本 統計는 水産業法 第72條의 規定에 의한 「遠洋漁船의 操業動態등의 報告에 關한 規則」(農水産部令 第667號, 1977.1.20改定)으로 遠洋漁業을 經營하는 者는 遠洋漁業에 從事하는 操業動態와 그 漁獲物의 販賣狀況을 國立水産振興院長을 거쳐 水産廳長에게 報告(同令 第2條)함과 동시에 報告書는 該當漁船別로 매항차 종료후 國內基地船(독항식 漁船 包含)은 30日內에 外國基地船은 60日內에 國立水産振興院長에게 提出(同令 第3條)하여야 하는 規定에 準하여 蒐集된 資料이다. 蒐集-整理-分析된 資料는 遠洋漁業의 資源動態把握과 遠洋漁業振興策 樹立 및 國際水産機構에 科學的 基礎評價資料로서 提供되고 있으며 특히 本 統計資料集에서와 같이 魚種別 資源豐度의 分布狀態와 時期別 中心漁場 把握등 漁況豫報資料로서 活用될 뿐 아니라 水産團體 및 關聯 機關에 앞으로 資源解析을 위한 基礎資料로서도 利用될 수 있을 것이다.

本 統計를 蒐集하여 整理 分析하기 까지의 段階的 作業 흐름도와 調査樣式은 그림1 및 表1과 같다. 한편 本 統計集에 수록된 1979年度의 標本率(coverage rate)은 $\frac{\text{당원집계 총어획량}}{\text{수산통계연보상의 총어획량}} \times 100$ 로서 計算했고 1975 ~ 1979年間은 表2와 같다.

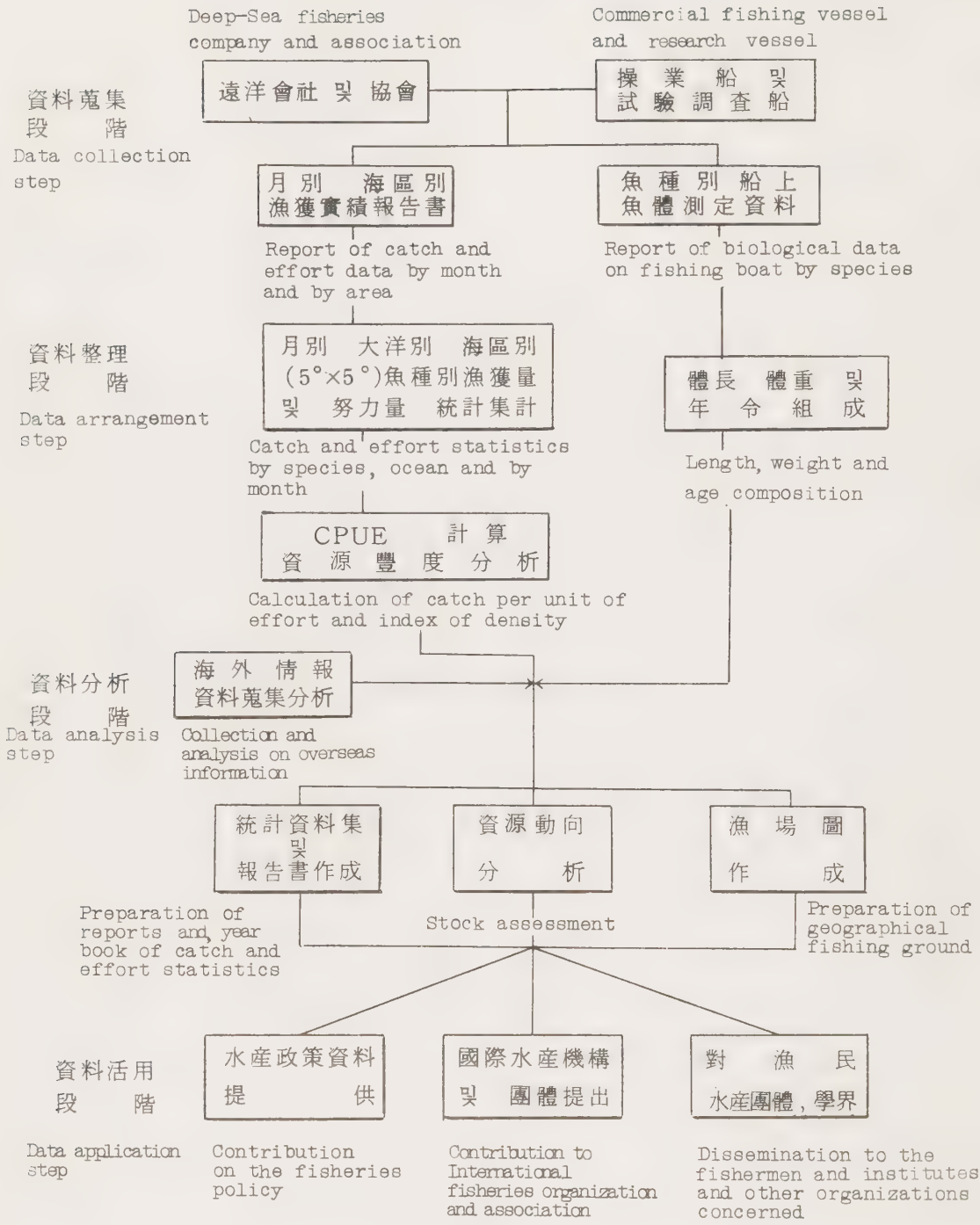

Deep-Sea fisheries company and association
Commercial fishing vessel and research vessel
遠洋會社 및 協會
操業船 및 試驗調査船
資料蒐集 段階
Data collection step
月別 海區別 漁獲實績報告書
魚種別 船上 魚體測定資料
Report of catch and effort data by month and by area
Report of biological data on fishing boat by species
資料整理 段階
Data arrangement step
月別 大洋別 海區別 (5°×5°)魚種別漁獲量 및 努力量 統計集計
體長 體重 및 年令 組成
Catch and effort statistics by species, ocean and by month
Length, weight and age composition
CPUE 計算 資源豊度 分析
Calculation of catch per unit of effort and index of density
資料分析 段階
Data analysis step
海外 情報 資料蒐集分析
Collection and analysis on overseas information
統計資料集 및 報告書作成
資源動向 分析
漁場圖 作成
Preparation of reports and year book of catch and effort statistics
Stock assessment
Preparation of geographical fishing ground
資料活用 段階
Data application step
水產政策資料 提供
國際水產機構 및 團體提出
對漁民 水產團體, 學界
Contribution on the fisheries policy
Contribution to International fisheries organization and association
Dissemination to the fishermen and institutes and other organizations concerned

그림 1. 統計資料蒐集 및 分析作業 흐름도

Fig 1. Flow chart of data processing

表 1. 漁獲量 調査表

(별지 제1호 서식) Table 1. Sheet form for catch statistics

기 관 명

(전화)

분류기호 :

수 신 : 국립수산진흥원장

참 조 : 원양자원조사과장

제 목 : 원양다랑이연승어업어획실적보고

보고년월일	년 월 일
선 장	성 명 ㊞
보고취급책임자	성 명 ㊞
항 해 기 간	년 월 일 항출항 / 년 월 일 항입항

보고선복		총 톤 수		톤	마 력		HP
항해일수01	차	입항년월일02	월 일	항해일수03	일	조업일수04	일	승무원 05	명

시행년월일
발 신 ㊞

조업형태 06	
1. 대서양(기지, 독항)	4. 기 타
2. 대서양(기지, 독항)	
3. 인도양(기지, 독항)	

어선규모 07	
1. 100톤~150톤	5. 301톤~350톤
2. 151톤~200톤	6. 351톤~400톤
3. 201톤~250톤	7. 401톤~450톤
4. 251톤~300톤	8. 451톤~이상

주어장 08	
1. 0도~북 180도 서태평양	4. 0도~남 180도 동태평양
2. 0도~남 180도 서태평양	5. 인 도 양
3. 0도~북 180도 동태평양	6. 대 서 양

주로사용한 이로 09	
1. 꽁 치	3. 기 타
2. 참 치	

비 고

1. 조업기간이 두개의 달에 걸쳐있을 때는 월별로 별지를 작성할것.
2. 조업형태로 부터 주로 사용한 이로까지의 란 및 정오위치의 N.S별 E.W별의 란은 해당되는 것에 ○ 표한다.
3. 어획량 어획량은 각란마다 상단은 중량(kg)을 하단은 마리수를 기재할것.

예 : kg / 마리수

4. 이 양식은 전자계산기 사용방식으로 작성되어 있으므로 임의로 개정 사용치 말것.
5. 각란에 표시되어 있는 숫자는 고유번호이므로 기재시 개의치 말것.

구분	정오위치 위도 도	위도 N.S별	경도 도	경도 E.W별	표면수온	낚시수 / 밧지수	다랑이류 날개다랑이 Albacore 40	황다랑이 Yellowfin 41	눈다랑이 Bigeye 42	참다랑이 Bluefin 43	인도다랑이 Southern bluefin 44	새치류 녹새치 Blue marlin 45	청새치 Striped marlin 46	황새치 Broadbill 47	백새치 White marlin 48	돗새치 Sailfish 49	가다랑이 Skipjack 50	상어 Shark 51	기타 Others 90	계 Total 99
월 일	20	21	22	23	30	31	40	41	42	43	44	45	46	47	48	49	50	51	90	99
1		1 N 2 S		1 E 2 W																
2		1 N 2 S		1 E 2 W																
3		1 N 2 S		1 E 2 W																
4		1 N 2 S		1 E 2 W																
5		1 N 2 S		1 E 2 W																
6		1 N 2 S		1 E 2 W																
7		1 N 2 S		1 E 2 W																
8		1 N 2 S		1 E 2 W																
9		1 N 2 S		1 E 2 W																
10		1 N 2 S		1 E 2 W																
11		1 N 2 S		1 E 2 W																
12		1 N 2 S		1 E 2 W																
13		1 N 2 S		1 E 2 W																
14		1 N 2 S		1 E 2 W																
15		1 N 2 S		1 E 2 W																
16		1 N 2 S		1 E 2 W																
17		1 N 2 S		1 E 2 W																
18		1 N 2 S		1 E 2 W																
19		1 N 2 S		1 E 2 W																
20		1 N 2 S		1 E 2 W																
21		1 N 2 S		1 E 2 W																
22		1 N 2 S		1 E 2 W																
23		1 N 2 S		1 E 2 W																
24		1 N 2 S		1 E 2 W																
25		1 N 2 S		1 E 2 W																
26		1 N 2 S		1 E 2 W																
27		1 N 2 S		1 E 2 W																
28		1 N 2 S		1 E 2 W																
29		1 N 2 S		1 E 2 W																
30		1 N 2 S		1 E 2 W																
31		1 N 2 S		1 E 2 W																
본항해의 어획량 및 금액					어획량 ㎏															
					금 액 ₩															
					미당평균증량															

表 2 . 年度別　大洋別　標本率　現況

Table 2 . The coverage rate by year and by ocean

單位 : %
Unit:percentage

大洋 Ocean / 年度 Year	大 西 洋 Atlantic Ocean	印 度 洋 Indian Ocean	太 平 洋 Pacific Ocean
1975	19.3	21.2	9.6
1976	49.8	19.8	17.8
1977	35.2	59.4	44.9
1978	39.4	65.4	64.7
1979	38.0	61.7	35.7

2 . 大洋別　海区別　漁場区分

操業船의　漁獲實績報告書는　매일의　操業位置를　緯度一經度　1°간격으로　表示하고　있어　이를　5°×5°　간격으로　再集計하여　本　統計를　作成하였다. 이　區分에　의한　漁場位置는　7 자리로　區分하고　있는데　즉,

$\frac{\times}{\text{海區의　크기}}$, $\frac{\times}{\text{像限}}$, $\frac{\times\times}{\text{緯度}}$, $\frac{\times\times\times}{\text{經度}}$ 이다.

여기서　區分된　수치의　例를보면　" 6205165 "일때　" 6 "은　5°×5°　간격을　表示하고　" 2 "는　像限 (그림 2 참조) 으로　Southeast를　나타내며　이때　" 05 "는　南緯를, " 165 "는　東經을　表示한다.

참고로　各像限區分의　수치는　다음과　같다.

1 . Northeast (NE)　　2 . Southeast (SE)

3 . Southwest (SW)　　4 . Northwest (NW)

그림 2. 像限區分圖

Fig 2. System for identifying statistical rectangle

3. 漁獲対象種의 種類 및 名称

本統計에서 漁獲對象種을 國名과 英名, 學名으로 나타내었으며 英名의 略字는 다음과 같다.

韓國名 (Korean name)	記 號 (Acronym)	英 名 (Common name)	學 名 (Scientific name)
참 다 랭 이	BFT	Bluefin tuna	Thunnus thynnus
황 다 랭 이	YFT	Yellowfin tuna	Thunnus albacarus
날개다랭이	ALB	Albacore tuna	Thunnus alalunga

눈다랭이	BET	Bigeye tuna	Thunnus obesus
가다랭이	SKJ	Skipjack tuna	Katsuwonus pelamis
황새치	SWO	Broadbill swordfish	Xiphias gladius
녹새치	BUM	Blue marlin	Makaira nigricans
청새치	STM	Striped marlin	Tetrapturus audax
백새치	WHM	White marlin	Tetrapturus albidus
돛새치	SAI	Sailfish	Istiophorus albicans
기타새치	OTB	Other billfishes	

한편 世界 다랭이類에 관한 分類學的 위치 및 魚種數와 특히 韓國名과 英名 및 日名을 表3과 같이 表示하여 앞으로 통조림 제조시 名稱사용에 참고토록 했고 동시에 美國 FDA (Food and Drug Administration)에서 다랭이類에 관하여 사용하고 있는 學名과 英名을 現在 사용하고 있는 名稱간의 차이를 비교 표시한 것이 表4이다.

表3－1．참치類의 分類 現況

Table 3－1. Classification for tunas and related species

Family	Subfamily	Tribe	Genus	No. of Species
Scombridae	Scombrinae	Tunas (Thunnini)	Auxis	2
			Euthynnus	3
			Katsuwonus	1
			Thunnus	7
		Bonitos (Sardini)	Allothunnus	1
			Cybiosarda	1
			Gymnosarda	1
			Orcynopsis	1
			Sarda	4
		Seerfishes (Scomberomorini)	Acanthocybium	1
			Grammatorcynus	1
			Scomberomorus	16
		Mackerels (Scombrini)	Rastrelliger	3
			Scomber	3
	Gasterochismatinae		Gasterochisma	1

表3－2．Tunas의 13種

Table 3－2. Tunas concerned

學名	英名	日名	韓國名
Auxis rochei	Bullet tuna	マルソウダ メジカ	
Auxis thazard	Frigate tuna	ヒラソウダ ソウダガツオ	물치다래 물치, 무태다랭이 목맨둥이

Euthynnus affinis	Kawakawa	-	-
Euthynnus alletleratus	Little tuna	ヤイト	-
Euthynnus lineatus	Black skipjack	-	-
Katsuwonus pelamis	Skipjack	カツオ	가다랭이
		マカツオ	가 다 리
		ホンガツオ	여다랭이
			강고등어
Thunnus alalunga	Albacore	ビンナガ	날개다랭이
	Longfin tuna	ビンチヨウ	
		トンホ	
Thunnus albacares	Yellowfin tuna	キハダ	황다랭이
		キワダ	
		イトシビ	
Thunnus atlanticus	Blackfin tuna	タイセイヨウマグロ	
		ミニマグロ	
Thunnus maccoyii	Southern bluefin tuna	ミナミマグロ	인도다랭이
		イントマグロ	
Thunnus obesus	Bigeye tuna	メバチ	눈다랭이
		バチ	
		ダルマ	
Thunnus thynnus	Bluefin tuna	クロマグロ	참다랭어
			다 랭 이
			다 랑 어
			참 치
Thunnus tonggol	Longtail tuna	-	-

表4. Tuna의 일반통용 名稱과 F.D.A 사용 名稱 比較

Table 4. Comparision of common name and F.D.A for tunas and related species

英名		學名	
일 반 통 용	F.D.A	일 반 통 용	F.D.A
Northern bluefin tuna	Bluefin tuna		Thunnus thynnus
	Oriental tuna	Thunnus thynnus	Thunnus orientalis
Southern bluefin tuna	Southern bluefin tuna	Thunnus maccoyii	Thunnus maccoyii
Albacore	Albacore	Thunnus alalunga	Thunnus genno
Blackfin tuna	Blackfin tuna	Thunnus atlanticus	Thunnus atlanticus
Bigeye tuna	Big-eyed tuna	Thunnus obesus	Parathunnus mebachi
Yellowfin tuna	Yellowfin tuna	Thunnus albacares	Neothunnus macropterus
Longtail tuna	Northern bluefin tuna	Thunnus tonggol	Neothunnus rarus
Skipjack	Skipjack	Katsuwonus pelamis	Katsuwonus pelamis
Kawakawa	Kawakawa	Euthynnus offinis	Euthynnus yaito
Little tunny	Little tunny	Euthynnus alletteratus	Euthynnus alletteratus
Black Skipjack	Little tunny	Euthynnus lineatus	Euthynnus lineatus

4. 大洋別 魚種別 平均重量

本 統計集의 漁獲量은 尾數로 表示되어 있으므로 이를 換算하기 위해 年度別 魚種別 調査된 尾當 平均重量을 表5.6.7에 表示했다.

表5. 大西洋 年度別 魚種別 平均重量

Table 5. Average weight (round weight) by year and by species in the Atlantic Ocean for 1975-1979

단위 : kg
Unit : kg

Species	1975	1976	1977	1978	1979
Albacore	21.7	20.5	20.8	22.2	21.0
Yellowfin	48.6	44.0	34.0	44.6	39.8
Bigeye	50.4	48.3	44.6	48.0	41.2
Bluefin	44.5	86.3	75.6		45.0
Blue marlin	92.3	104.3	108.8	98.6	68.2
Broadbill(Sword fish)	56.3	63.0	55.3	61.8	58.8
White marlin	27.4	26.0	25.2	29.7	30.6
Sailfish	21.1	22.2	23.3	21.6	20.6
Skipjack	2.0	5.0	10.2	6.6	13.6
Other billfishes					30.6
Others	24.6	18.4	27.4	18.5	20.7

表 6 . 印度洋 年度別 魚種別 平均重量

Table 6 . Average weight (round weight) in the Indian Ocean

단위 : kg
Unit : kg

Species	1975	1976	1977	1978	1979
Albacore	20.2	21.6	21.1	19.8	19.9
Yellowfin	34.7	34.2	36.1	32.3	34.3
Bigeye	43.0	35.2	36.8	35.9	38.0
Bluefin	75.7	75.6	64.1	38.7	
Blue marlin	76.6	80.2	82.0	73.3	65.5
Striped marlin	49.5	49.5	62.3	47.0	46.3
Broadbill (swordfish)	54.5	52.7	49.7	45.4	44.2
Sailfish	26.0	29.6	47.8	42.3	32.1
Skipjack	7.0	4.5	6.7	12.1	8.1
Sharks					45.9
Other billfishes					46.8
Others	18.8	27.2	27.7	24.4	24.0

表 7 . 太平洋 年度別 魚種別 平均重量

Table 7. Average weight (roun weight) in the Pacific Ocean

단위 : kg
Unit : kg

Species	1975	1976	1977	1978	1979
Albacore	20.0	18.6	14.3	15.1	14.5
Yellowfin	38.2	37.0	27.8	30.9	27.4
Bigeye	53.9	45.7	33.0	34.6	34.0
Bluefin	85.0	86.7	87.6	47.0	37.0
Blue marlin	74.3	88.5	84.6	51.6	68.0
Striped marlin	58.1	81.2	59.4	47.5	52.9
Broadbill (swordfish)	51.9	66.0	59.4	49.8	48.6
Sailfish	26.3	31.5	30.5	25.1	29.4
Skipjack	9.8	7.6	11.6	6.6	5.9
Sharks					52.1
Other billfishes					61.5
Others	35.6	35.6	22.4	16.0	24.7

Ⅲ. 韓國의 다랭이類 生産動向

우리나라의 遠洋다랭이 漁業은 1957年 첫 試驗操業을 효시로 하여 1962年에 5隻이 出漁操業하므로서 實質的인 資源利用에 들어갔다.

年度別 漁船勢力의 伸張은 1974年에 最高 567隻까지 도달한후 다소 減少하여 1979年에는 451隻이 出漁했다. 또한 生産量에서도 每年 增獲되어 1973年에는 100千㎏을 漁獲하므로서 安定된 狀態에 도달했으며 1979年에는 141千㎏을 生産하여 漁獲이 가장 많았던 1977年比 17.8%가 減少하였는데 이런 現象은 遠洋漁業 漁船 중 經營수지가 낮고 노후선의 비중이 큰 다랭이기지선의 사고선박에 대한 미보충과 合作投入을 비롯하여 전업등의 生産부진에 기인된 것이라 하겠다. 한편 漁業經營과 密接한 關係를 가지고 있는 輸出 伸張은 1973-74年期에 漁獲量이 18.2% 增加에 比해 輸出額은 겨우 1.0% 增加 했으나 1977年에는 生産量增獲과 더불어 다랭이類 魚價의 상승으로 輸出額은 1976年比 47.0%(61,120千$)의 괄목 할만한 伸張을 이루었다.(表8)

表8. 年度別 出漁隻數, 生産量 및 輸出額 現況

Table 8. The status of export price, catches and operating boats by year

區分 Item \ 年度 Year	1962	1967	1971	1972	1973	1974	1975	1976	1977	1978	1979
出漁隻數 (隻) Operating boats	5	170	291	360	440	567	558	501	501	482	451
漁獲量 (㎏) Nominal catch in metric-ton	657	38,460	83,784	97,670	103,332	122,216	144,426	147,651	171,604	162,726	140,982
輸出額 (千$) Export price in 1,000 dollars	209	12,344	51,570	62,777	88,254	89,097	107,564	130,149	191,269	176,804	186,000

資料 : 農水産部 水産統計年報, 1980.

Data source : Year book of fisheries statistics, 1980. Ministry of Agriculture and fisheries, Republic of Korea.

魚種別 生産量 動向은 황다랭이 및 눈다랭이는 減少 傾向에 있고 반면에 가다랭이는 增加 傾向에 있다. (表 9)

表 9. 年度別 魚種別 生産量 現況

Table 9. Catch of tunas and tuna like fishes by species and by year

單位: 𝑀𝑡

Unit: metric-ton

年度 Year / 區分 Item / 魚種 Species	1975 生産量 Catch	%	1976 生産量 Catch	%	1977 生産量 Catch	%	1978 生産量 Catch	%	1979 生産量 Catch	%
合計 Total	144,426	100	147,651	100	171,604	100	162,726	100	140,982	100
참다랭이 Bluefin	285	0.2	70	0.05	10		119	0.1	82	0.1
황다랭이 Yellowfin	38,663	26.8	40,037	27.1	65,385	38.1	51,690	31.8	46,199	32.8
날개다랭이 Albacore	18,111	12.5	22,641	15.3	22,952	13.4	20,508	12.6	17,485	12.4
눈다랭이 Bigeye	52,087	36.1	49,970	33.8	50,547	29.5	51,458	31.6	43,112	30.6
가다랭이 Skipjack	9,384	6.5	9,224	6.2	7,099	4.1	16,659	10.2	19,753	14.0
새치류 Billfishes	9,860	6.8	14,959	10.1	10,839	6.3	10,860	6.7	10,741	7.6
기타 Others	16,036	11.1	10,750	7.3	14,772	8.6	11,432	7.0	3,610	2.6

資料: 農水産部 水産統計年報, 1980.

Data source: Year book of fisheries statistics, 1980. Ministry of Agriculture and fisheries, Republic of Korea.

大洋別 生産量을 보면 漁獲量이 가장 많았던 1977年에는 印度洋 海域에 165隻出漁, 66,015㎏으로 가장 많았고 다음이 太平洋 217隻出漁 59,985㎏, 大西洋 119隻, 45,604㎏였으며 隻當 漁獲量은 印度洋이 400㎏으로 首位였고 大西洋 383㎏에 이어 太平洋 276으로 나타났다며, 1979年에는 印度洋에 出漁隻數 174隻, 漁獲量 46,176㎏으로 '77年比 30.1% 減少했으며 太平洋은 211隻에 57,323㎏으로 '77年比 4.4%가 減少했고, 大西洋은 66隻에 37,483㎏으로 '77年比 17.2%가 減少했다. 隻當 漁獲量은 印度洋이 265㎏, 大西洋이 568㎏ 太平洋이 272㎏으로 '77年比 印度洋에서는 減少했으나 太平洋과 大西洋에서는 오히려 增加했다(表10)

表10. 大洋別 漁船勢力 및 生産量 比率

Table 10. The catches and operating boats by Ocean

年度 Year / 區分 Item / 大洋 Ocean	1975			1976			1977			1978			1979		
	隻數 No. of boat.	生産量 (㎏) catch	隻當漁獲量 (㎏) catch per boat	隻數 No. of boat	生産量 (㎏) catch	隻當漁獲量 (㎏) catch per boat	隻數 No. of boat	生産量 (㎏) catch	隻當漁獲量 (㎏) catch per boat	隻數 No. of boat	生産量 (㎏) catch	隻當漁獲量 (㎏) catch per boat	隻數 No. of boat	生産量 (㎏) catch	隻當漁獲量 (㎏) catch per boat
合計 Total	558	144,426	259	501	147,651	295	501	171,604	343	482	162,726	338	451	140,982	313
太平洋 Pacific Ocean	253	49,569	196	257	68,771	268	217	59,985	276	223	51,597	231	211	57,323	272
大西洋 Atlantic Ocean	120	46,949	391	117	35,383	302	119	45,604	383	108	40,006	370	66	37,483	568
印度洋 Indian Ocean	185	47,908	259	127	43,497	342	165	66,015	400	151	71,123	471	174	46,176	265

資料：農水産部 水産統計年報, 1980.

Data source : Year book of fisheries statistics, 1980.
Ministry of Agriculture and fisheries, Republic of Kore

Ⅳ. 大洋別 海區別 漁種別 漁獲量(尾數)및 努力量

Catch in number and effort data by species , area and by Ocean .

大洋別　月別　魚種別　總 漁獲量

Total catch by species, by month and by Ocean.

大洋別　月別　魚種別　總 漁獲量

Total catch by species, by month and by Ocean.

1. 大西洋 月別 魚種別 漁獲量(尾数) 및 努力量

Monthly total catch in number and effort in the Atlantic Ocean, 1979

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
1				1562254	34262		9252	10618
2				1369838	22579		7601	4856
3				1673119	28492		6654	6993
4				1474324	20113		8517	4708
5				1105817	17475		4916	6406
6				876207	15409		4888	5462
7				911604	14714		8791	1281
8				1038789	14156		5596	1365
9				266729	17362		6005	2018
10				937598	15232		4575	1261
11				720528	11385		2129	2022
12				700647	14131		2621	5097

눈다랭이 BET	가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
11632		645	83	69	1235		728
7684		531	77		605	78	1147
11990		689	122		780	116	1148
4880		639	29		542	130	668
3454		671	14	22	732	611	649
3435		376	4		312	224	708
3300		253			313	169	607
5305		568			895	131	296
7703		343	29		533	180	551
7661		633	101		309	129	563
5960		642	113		142	59	318
5186		531	49		283	99	265

2 印渡洋 月別 魚種別 漁獲量(尾数) 및 努力量

Monthly total catch in number and effort in the Indian Ocean, 1979

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 quad.	위도 Lat.	경도 Long.					
1				3111641	52611	19957	1484	24884
2				3454542	73603	32566	1066	31183
3				4628959	69776	30044	2945	26039
4				4971316	91332	30292	9017	39924
5				5109214	95117	31433	4052	46614
6				4103198	60401	18512	2453	31503
7				4220210	61001	18233	1435	32425
8				4267955	61398	22737	3787	27840
9				4261042	65615	24605	4233	30026
10				3795842	64736	28635	1783	27669
11				3135436	54561	21564	1263	27643
12				2903258	47008	16726	1094	24329

가다랭이 SKJ	황새치 SWO	흑새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
142	867	545	250		395	899	3188
193	714	826	664	345	421	2624	3001
167	416	912	1104	306	363	1591	5889
180	1057	1348	914	299	301	919	7081
233	733	1161	735	168	291	985	8712
91	523	940	464	286	414	1026	4189
93	1159	742	1307	150	718	1026	3713
129	392	765	1005	214	269	516	3744
	478	936	463	122	819	490	3443
51	472	244	986	168	228	925	3575
85	522	717	748	59	306	687	967
72	471	962	520	108	663	976	1087

3. 太平洋 月別 魚種別 漁獲量(尾数) 및 努力量

Monthly total catch in number and effort in the Pacific Ocean, 1979

월 Month	해 Area 역			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 quad.	위도 Lat.	경도 Long.					
1				3326659	66738	300	27698	14855
2				2769589	51541		27979	6938
3				2785211	49237		25275	8927
4				2705347	65627		20081	31792
5				2806790	77208		26163	37048
6				2375250	59632	50	19637	24725
7				2556807	66084	35	20908	28014
8				2463052	63708	10	24336	22895
9				2264547	60248	16	27294	12309
10				2348378	55832	24	27612	7789
11				2022447	43994		16609	8372
12				2069788	50566		19824	14842

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
18841	461	201	980	379	1087	422	149	1365
12607	473	151	771	291	1086	153	44	1048
9780	587	145	799	162	1648	358	212	1344
8575	322	167	743	156	1074	285	112	2320
8871	309	171	643	187	1267	205	338	2006
8873	406	133	545	200	2302	425	330	2006
11796	233	160	669	481	1992	774	129	893
12778	207	158	512	151	251	653	255	1502
17221	375	160	570	102	760	536	207	698
15618	605	164	557	683	2167	308	102	203
14638	125	128	578	168	2834	299	94	149
11822	141	202	442	136	2196	134	368	459

大　西　洋

Atlantic Ocean

大　　西　　洋

Atlantic Ocean

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No. of hooks	비 Total	참다랑어 BFT	황다랑어 YFT	날개다랑어 ALB
	63	00	000	14580	308		30	1
	63	00	005	2907	51		7	1
	63	00	015	11371	223			2
	63	00	020	4840	47		13	4
	63	00	025	65004	857		373	37
	63	00	030	87724	1404		652	425
	63	00	035	31667	933		770	95
	63	05	015	4758	84			
	63	05	020	114366	1924		264	305
	63	05	025	259553	8620		125	1209
	63	05	030	29333	248		6	192
	63	10	020	23792	359		5	278
	63	10	025	77730	1442		27	1151
	63	10	030	9597	131			120
	63	10	035	43950	1084		628	143
	63	15	020	9845	161		39	15
	63	15	035	7220	105			97
	64	00	020	7501	35		10	
	64	00	025	7500	131		31	3
	64	00	030	86081	2176		1229	100
	64	00	035	65012	1840		1403	31
	64	00	040	76672	1450		1121	16
	64	00	045	5965	94		50	12
	64	05	020	3750	24		10	
	64	05	025	18752	153		79	
	64	05	030	9324	92		57	2
	64	05	035	5626	106		58	16
	64	05	040	18621	316		339	9
	64	05	045	72106	1654		817	136
	64	10	030	43247	371		45	3
	64	10	040	11251	82		18	12
	64	10	045	26253	306		41	

눈다랭이 BET	가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돛 새 치 SAI	검삼새치 BIB	기 타 Others
230		5					[illegible]
33							10
216							5
25							5
365		[illegible]	1		15		39
286		22	[illegible]		5		[illegible]
33		22	3		5		8
79							5
1251		36	9		15		44
6963		143	19	20	88		53
12		8	1		15		14
3		36	3				34
16		75	13		49		111
		10	1				
88		5	1		195		24
95		7					5
		2	1				5
25							
30		2			15		
556		42	3	23	107		116
253		34	7		58		44
95		63	4		117		34
6		2			24		
11		2	[illegible]				
45		8	1		10		10
5		7	1				10
20		2			10		
46				10	112		
281		17	3	16	360		24
272		27			6		10
4		2	[illegible]		5		
109		3	[illegible]		5		37

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	64	25	070	5954	75		21	53
	64	30	060	171087	4288		522	3608
	64	30	065	113891	2644		343	2225
	64	30	070	2766	38		14	24
	64	35	055	12658	306		16	257
2	63	00	020	2953	4		1	
	63	00	025	32640	571		195	195
	63	00	030	9739	86		55	5
	63	00	035	8614	144		28	4
	63	05	015	35441	788		6	88
	63	05	020	33636	722		19	
	63	05	025	29392	451		3	23
	63	05	030	35605	841		91	125
	64	00	015	2461	31		5	4
	64	00	020	66591	1320		918	52
	64	00	025	88942	1103		512	23
	64	00	030	137236	1923		1064	141
	64	00	045	2871	51		24	1
	64	05	020	90607	1733		962	58
	64	05	025	284667	3713		997	121
	64	05	030	75236	1344		933	20
	64	05	035	2930	33		17	
	64	05	045	25160	357		118	49
	64	05	050	31347	760		462	103
	64	05	055	22502	238		202	2
	64	10	025	18518	133		17	3
	64	10	030	76789	809		131	14
	64	10	035	17360	156		39	17
	64	10	040	3150	48		9	13
	64	10	045	3240	62		3	3
	64	10	050	8694	378		132	19
	64	10	065	5977	39		8	10

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
			1				
109		17	3		10		19
37		19	1				19
33							
1		2					
162		15	4				
12		3	1				10
73					29		10
653		36			5		
697		5	1				
417		2	1				5
622		2	1				
20		2					
164		32	4		34		116
460		30	12		49	3	14
473		85	10		5		145
4		2			15		5
340		59	25		92	13	184
2329		104	3		88	3	68
258		30	1		68		34
11							5
89			1		97	3	
25		5			44		121
2		2	1		29		
97		10	1		5		
595		44	1		10		14
92		7	1				
		2			10		14
3							53
15		3	1		10		198
			1			10	10

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
	64	10	075	9681	143		12	91
	64	15	045	3282	26		5	21
	64	15	060	9230	92		39	34
	64	15	065	21817	418		206	123
	64	20	050	2860	28		1	15
	64	20	065	8966	76		21	49
	64	25	060	9036	109		18	62
	64	25	065	38651	977		153	790
	64	25	070	2625	72		9	62
	64	30	060	39168	1154		84	1017
	64	30	065	72224	1646		102	1499
3	63	00	025	76761	1193		504	5
	63	00	030	14603	220		148	15
	63	00	035	31832	423		279	18
	63	05	015	8860	162		2	23
	63	05	020	66745	1341		62	60
	63	05	025	69044	1178		12	61
	64	00	020	115636	1837		656	65
	64	00	025	68991	1537		439	426
	64	00	030	24647	896		312	
	64	00	035	53385	1864		588	3
	64	00	040	18752	257		94	30
	64	00	045	22502	396		119	86
	64	05	020	187054	2277		406	26
	64	05	025	55652	969		83	16
	64	05	030	101844	1273		383	54
	64	05	035	76096	822		399	40
	64	05	050	58149	825		557	99
	64	05	055	30190	523		293	94

눈다랭이 BET	가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
1						20	19
2		2	1				14
9		8	3			6	63
1			1				10
			1				5
2		2				20	5
8		5	1		10		10
1							
28		20					5
18		12			5		10
641		17	7		19		
23		15	3			6	10
91		22	13				
105		7			19	6	
1090		61			15		53
1024		27	1		34		19
629		78	42		63	33	271
254		27	10		268	7	106
551		3	1		29		
1257		5	1		10		
88		15	1		29		
138		8	1		44		
1507		119	6		5		208
765		24	3		5		73
680		48	1		15		92
309		34	6		24		10
34		17	6		49		63
58					44		34

월 Mont.	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
	64	10	020	7070	86		13	
	64	10	025	104472	1839		78	7
	64	10	030	65509	758		102	30
	64	10	035	30289	287		84	36
	64	10	040	19886	182		63	22
	64	10	050	5865	62		41	12
	64	10	055	27325	321		126	102
	64	10	060	5391	39		17	2
	64	10	070	21506	413		227	85
	64	15	060	4808	40		10	9
	64	15	065	33307	418		139	132
	64	15	070	21506	30		4	22
	64	20	055	5086	59		10	43
	64	20	060	5160	45		1	39
	64	25	060	26628	388		39	340
	64	25	065	9985	193		15	175
	64	30	055	61319	1878		65	1699
	64	00	060	103558	2736		230	2460
	64	00	065	19783	362		31	322
	64	00	070	13923	363		23	335
4	63	00	010	444879	1304		498	77
	63	00	015	28902	682		6	21
	63	00	020	25400	460		231	16
	63	00	025	4840	71		29	14
	64	00	015	41160	541		408	26
	64	00	020	97030	1852		1446	40
	64	00	025	14860	3891		2695	11
	64	05	020	31625	356		166	
	64	05	025	42811	518		90	11
	64	05	030	95138	1572		270	36

눈다랭이 BET	가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
64		8	1				
1692		41	1		10		10
585		20	1		15		5
141		10	1		10		5
54		37	1				5
2		2			5		
19		5	1		10		58
6							14
22		8	4			33	34
1			1		19		
10		14	8		29	13	73
			1			3	
1					5		
					5		
3						6	
						3	
104		10					
30		5				6	5
9							
3		2					
691		19			19		
616		20					19
186		22					5
21		2					5
66		12			10		19
149		59	7		15		136
507		187	22		44	20	300
170		20					
404		8					5
1189		29					48

월 Month	해 역 Area 상 한 Quad.	위 도 Lat.	경 도 Long.	낚 시 수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	64	05	035	12634	147		78	16
	64	05	040	3300	32		9	5
	64	05	045	45942	554		313	148
	64	05	050	106527	1310		777	128
	64	05	055	11720	147		96	10
	64	10	025	14533	119		22	
	64	10	030	43598	499		84	2
	64	10	045	8925	77		19	33
	64	10	050	37982	350		193	58
	64	10	055	76939	1034		561	271
	64	10	060	2696	24		6	5
	64	10	065	9681	119		34	56
	64	15	025	7266	35		2	1
	64	15	065	6270	50		7	21
	64	20	065	28831	303		88	169
	64	20	070	3328	54		5	29
	64	25	065	12757	214		32	170
	64	25	070	15770	173		25	113
	64	30	065	84349	1419		68	1295
	64	30	070	114631	2206		259	1821
5	63	00	020	3938	34		14	5
	63	00	025	3657	8		1	2
	63	00	030	6563	54		5	8
	64	00	015	42754	430		139	
	64	00	020	32312	265		99	28
	64	00	025	120411	1327		307	75
	64	00	030	57217	780		437	25
	64	00	035	29534	317		123	38
	64	00	040	62350	608		292	90
	64	00	045	3281	12		3	2

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 · BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
34		14					5
3		10					5
88		5					
159		51			166		29
2					39		
77		10			5		5
261		54			88		10
6		19					
58		36			5		
80		25			97		
3					10		
4						6	19
17		10					5
4		2				6	10
12		5				10	19
						20	
4					5	3	
					15	20	
31		12			5	3	5
38		8			19	42	19
10							5
5							
39		2					
286		5					
79		25			15		19
276		41	4		24	3	97
267		7					44
121		30					5
160		53			5	3	5
4		3					

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
	64	05	015	8790	130		13	7
	64	05	020	51333	876		273	28
	64	05	025	8924	126		94	3
	64	05	030	60775	389		190	42
	64	05	035	37954	376		191	13
	64	05	040	20920	268		76	6
	64	05	045	81407	1399		661	72
	64	05	050	2285	23		8	
	64	10	020	52224	512		163	
	64	10	030	17064	217		143	3
	64	10	035	30866	458		254	20
	64	10	055	3516	24		7	8
	64	10	060	24325	321		74	133
	64	10	065	12464	144		67	42
	64	15	060	2871	59			35
	64	15	065	21117	419		41	190
	64	20	060	2871	69		2	35
	64	20	065	198323	5026		458	3657
	64	20	070	105771	2804		281	1839
6	63	05	015	32816	583		99	1
	63	05	020	55272	1105		69	48
	64	00	030	19280	365		197	54
	64	00	035	2438	20		7	2
	64	00	040	12189	191		30	30
	64	00	045	4876	44		10	16
	64	05	015	66570	803		311	
	64	05	020	33004	345		102	
	64	05	025	115828	1612		1199	60
	64	05	030	69777	792		471	24
	64	05	035	8684	138		24	6
	64	05	040	4952	49		4	3
	64	05	045	69933	792		278	54

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
103		7					
514		41			10		10
5		5			5		14
76		37			5		39
129		19			10		14
176							10
598		24			15		29
13		2					
330					19		
54		7			5		5
108		32			15		29
4					5		
9		8					97
3		3					29
					24		
5		3			122		58
		3			29		
50		306	10	6	346	111	82
30		8		16	78	494	58
464							19
929		39			15		5
51		2				3	58
11							
109		7			5		10
18							
476		10	1				5
209					34		
248		20	1		10	6	68
219		19			15		44
98		5					5
40		2					
366		22			19		53

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	64	05	050	3282	57		48	
	64	05	055	14767	349		312	
	64	10	030	54746	656		434	8
	64	10	050	5977	58		23	15
	64	10	065	29534	690		39	507
	64	15	060	27404	521		406	99
	64	15	065	57381	1608		614	759
	64	20	060	9423	182		7	159
	64	20	065	59778	1170		81	894
	64	20	070	100977	3011		102	2513
	64	25	065	5776	61		4	54
	64	25	070	11543	207		17	156
7	63	00	015	95729	1519		669	
	63	05	015	2379	12			
	63	05	020	45356	920		16	52
	64	00	020	2461	18		7	
	64	05	015	7501	52		21	
	64	05	025	40772	573		268	170
	64	05	030	117007	1909		1140	189
	64	05	035	29804	443		176	44
	64	05	045	12540	113		97	3
	64	05	050	15951	88		34	2
	64	05	055	15365	218		141	11
	64	10	030	6563	71		12	
	64	10	035	59069	704		273	14
	64	10	055	33006	358		93	40
	64	10	060	110807	1810		1507	84
	64	10	065	169117	3542		2854	90
	64	10	070	15013	264		135	26

눈다랭이 BET	가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
4					5		
		3			34		
129		27			24		34
10					10		
3		15					126
5		8				3	
17		24			10		184
1		5				10	
4		75	1		29	52	34
14		71	1		102	150	58
		3					
10		19					5
850							
12							
808		24			15		5
		10					1
31							
84		2			10		39
433		15			5	6	121
196		17			5		5
8					5		
15						3	34
44		12					10
52		7					
373		44					
83		22			83	3	34
93		20			83	23	
139		25			102	42	290
9		2				92	

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
	64	15	060	26171	350		286	37
	64	15	065	57298	1183		981	76
	64	20	060	2888	31		2	29
	64	20	065	20142	226		19	181
	64	20	070	23102	245		22	216
	64	25	025	3563	65		38	17
8	63	00	015	18002	185		69	
	63	05	015	20229	376		65	69
	63	05	020	9323	149		11	24
	64	05	025	129360	1670		1148	39
	64	05	030	32942	391		207	71
	64	05	035	61389	930		381	33
	64	05	040	66590	730		328	74
	64	05	045	22690	297		95	17
	64	05	050	79196	910		527	81
	64	05	055	3340	119		17	3
	64	10	015	3141	45		30	3
	64	10	020	3094	15		6	2
	64	10	025	3478	7		1	2
	64	10	035	136028	1778		189	55
	64	10	040	109362	1541		206	18
	64	10	045	38172	501		21	23
	64	10	050	14348	243		64	70
	64	10	055	61168	873		248	61
	64	10	060	38575	489		331	32
	64	10	065	100041	1678		1139	197
	64	10	070	12076	452		346	48
	64	15	025	3821	22		9	
	64	15	055	10977	120		25	86
	64	15	060	3126	25		16	1
	64	15	065	6251	97		67	7

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	백새치 WHM	돗새치 SAI	기타새치 OTB	기 타 Others
13		14					
45		8			5		68
2		24					
		7					
10							
116							
242							
114							
397		10			15	3	58
81		5				3	24
464		15			5	3	29
286		8			15		19
32		148			5		
73		185			44		
13					83	3	
7							5
2					5		
4							
1466		48			10		10
1244		19			49		5
439		3			15		
65					44		
83		93			336	42	10
37		25				6	58
78		3			156	42	63
4					44		10
13							
1		2				6	
5						3	
3						20	

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
	64	20	060	5349	25		4	17
	64	20	065	14945	129		25	99
	64	20	070	2574	14		2	11
	64	25	070	2888	11		4	7
	64	35	060	2578	14			2
	64	40	040	3106	18		5	7
	64	40	050	10314	206		1	185
	64	40	060	5157	83		7	21
	64	40	065	5157	13		2	
9	63	05	015	142103	2480		163	137
	63	05	020	65263	1089		46	64
	63	05	025	39533	581		37	49
	64	00	005	7761	90		28	17
	64	00	015	26491	310		45	32
	64	00	020	7466	85		46	3
	64	00	025	3657	14		5	2
	64	00	030	10884	54		34	11
	64	00	035	3118	54		14	34
	64	00	040	51451	818		336	252
	64	00	045	3750	28		18	5
	64	05	020	48638	425		76	53
	64	05	025	82693	825		445	100
	64	05	030	24167	188		87	36
	64	05	035	3106	29		17	2
	64	05	040	25409	393		104	68
	64	05	045	71580	926		293	92
	64	05	050	28937	183		47	30
	64	10	020	11251	49		22	
	64	10	025	16449	181		79	1
	64	10	030	37445	243		25	6
	64	10	035	118673	2081		245	69

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
2		2					
3		2					
1							
2					10		
1					5		
15					5		
11					44		
1					5		5
1997		59	23		54	13	34
903		54			5	3	14
438		24			15	13	5
42		3					
212		15	6				
31		5					
2							5
9							
1					5		
58		14			126	13	19
							5
247		5					44
225		3			5	3	44
58		2					5
10							
167					49		5
428		5			49	6	53
39		3			44	10	10
22					5		
84						3	14
199		3			10		
1684		44			19	6	14

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
	64	10	040	16414	138		12	6
	64	10	045	65664	634		73	13
	64	10	055	2637	21		4	5
	64	10	060	16689	253		170	39
	64	10	065	41216	462		295	66
	64	10	070	49825	974		585	258
	64	10	075	3126	29		21	3
	64	15	045	3047	25		4	11
	64	15	065	111470	2039		1393	267
	64	15	070	51951	1555		1164	265
	64	15	075	6094	106		72	22
10	63	00	020	3164	39		8	2
	63	00	025	57674	1313		83	56
	63	00	030	29124	291		74	26
	63	00	035	11438	51		28	1
	63	00	040	7838	78		28	37
	63	05	020	59291	663		20	47
	63	05	025	170410	3264		80	146
	63	05	030	18218	152		73	16
	64	00	015	80748	1164		172	6
	64	00	020	34269	691		41	19
	64	00	025	32582	627		37	42
	64	00	035	6873	48		20	12
	64	00	040	43111	691		473	101
	64	05	015	24448	307		17	
	64	05	030	6639	53		21	2
	64	05	035	12874	123		44	4
	64	05	040	23182	245		99	51
	64	05	045	36511	360		94	13
	64	10	025	19739	203		44	
	64	10	060	62441	1312		820	167
	64	10	065	77415	1158		585	220

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돗 새 치 SAI	기타새치 OTB	기 타 Others
112					5	3	
517					15	16	
2							10
12		22					10
35		10			24	13	19
32		2			44	39	14
		2				3	
					5		5
89		66				26	198
46		2			49	10	19
2					5		5
25		3	1				
1051		93	1		5		24
146		7	1		15	3	19
6			1		5		10
4		3	1				5
536		24	7		10		19
2726		148	29		49	33	53
39		3	1		15		5
898		32	7		5		44
548		68			5		10
496		36	1		10		5
10			1		5		
33		17	9		29		29
252		37	1				
25					5		
70					5		
65		5	1		19		5
219		8	6		15		5
132						3	24
92		12	7		78	20	116
136		14	6		24	42	131

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
	64	10	070	3126	44		5	22
	64	15	060	35943	527		338	98
	64	15	065	75682	1358		1019	135
	64	15	070	26858	470		352	38
11	63	00	010	6563	125		5	
	63	00	015	23872	300		21	28
	63	00	020	14989	143		49	1
	63	00	025	194160	4074		207	271
	63	00	030	3446	26		11	4
	63	05	010	46191	668		14	94
	63	05	015	88263	1447		24	222
	63	05	020	6094	67		1	15
	63	05	025	24729	340		18	144
	63	05	030	3047	34		2	7
	63	10	020	26253	531		16	439
	63	10	025	6563	112		4	97
	64	00	010	8778	138		3	
	64	00	015	17193	213		11	6
	64	00	020	5274	64		4	5
	64	00	030	92114	1216		624	358
	64	00	035	28784	307		170	83
	64	00	040	18189	165		101	24
	64	05	015	5274	67		4	4
	64	05	030	2930	29		10	3
	64	10	060	18131	270		180	31
	64	10	065	24973	328		234	43
	64	15	060	24667	339		210	51
	64	15	065	30051	382		206	92

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	백 새 치 WHM	돛 새 치 SAI	기타새치 OTB	기 타 Others
8		2	1			6	
50		19	6			6	10
71		100	12		10	6	5
23		2	1			10	44
95		20					5
198		27	7				19
60		20	3				10
3173		279	76		10		58
7		3	1				
501		30			5		24
1059		82	1		15		44
50			1				
120		12			24	3	19
20					5		
22		20				20	14
3		5				3	
123		7					5
176		15					5
46		8	1				
103		8	6		49		68
26		3	1		10		14
13		7	1				19
56		3					
11					5		
17		39	3				
23		15	3			10	
27		12	3		19	3	14
31		27	6			20	

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
12	62	05	000	3000	37		1	
	63	00	000	27172	480		30	
	63	00	005	24771	721		67	5
	63	00	010	9582	120		23	9
	63	00	020	10348	218		17	11
	63	00	025	129369	3475		267	132
	63	05	000	24002	303		2	
	63	05	025	45918	900		23	784
	63	10	025	49191	1084		32	939
	64	00	010	16947	186		11	
	64	00	015	13126	79		9	1
	64	00	030	22221	294		191	13
	64	00	035	111656	2390		1633	298
	64	00	040	4571	59		54	
	64	05	015	20768	258		3	
	64	05	025	35441	331		133	54
	64	05	030	12669	119		25	13
	64	05	045	4571	22		5	
	64	15	040	4571	17		8	
	64	30	065	66690	1488		37	1395
	64	30	070	64063	1550		50	1443

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	백새치 WHM	돗새치 SAI	기타새치 OTB	기 타 Others
31							5
397							53
561		88					
86		2					
174		15	1				
2761		255	16				44
282							19
16		25			5	23	24
11		36			10	42	14
167		3					5
69							
35		24	15		5	6	5
119		54	13		243	6	24
2		2	1				
226		10					19
121		2	1		10		10
61			1				19
14		3					
6		3					
18		7			5	16	10
29		2	1		5	6	14

印　　度　　洋

Indian Ocean

印　　度　　洋

Indian Ocean

월 Month	해 역 Area			낚 시 수 No. of hooks	계 Total	황다랑어 YFT	눈다랑어 ALB	눈다랑어 BET
	구 획 Quad.	위 도 Lat.	경 도 Long.					
1	61	00	040	2640	46	20		17
	61	00	045	19222	335	104		215
	61	00	050	356014	5905	2615	1	2483
	61	00	055	360573	5781	2557	252	2409
	61	00	060	281636	4596	1692	100	2016
	61	00	065	214548	4438	1792	1	2258
	61	00	070	36370	734	324		329
	61	00	075	54747	1243	344		829
	61	00	080	21125	257	63		171
	61	00	085	9522	181	33		128
	61	00	090	20410	511	65		423
	61	05	045	5565	63	11	18	23
	61	05	050	94072	1558	184		896
	61	05	055	31413	384	185		143
	61	05	060	187966	2992	472		1921
	61	05	065	192778	3280	412		2382
	61	05	070	12089	119	44		71
	61	05	075	15690	260	34		190
	61	05	080	2900	13	8		3
	61	05	090	3120	10	1		8
	62	00	040	57005	951	397	4	514
	62	00	045	72404	819	429	1	314
	62	00	050	60772	587	372		153
	62	00	055	80189	1013	592		311
	62	00	060	83583	1317	669		515
	62	00	065	41399	520	240	1	238
	62	00	070	5655	70	22		43
	62	00	075	29769	465	87		328
	62	00	085	3050	43	5		36
	62	00	090	3321	17	3		10
	62	05	040	213156	4107	2143	149	1432
	62	05	045	145571	2293	1071	65	930
	62	05	050	26127	356	272	2	46
	62	05	055	78808	1185	723	42	261
	62	05	060	41501	491	251		202
	62	05	065	8120	197	30		158

가다랑어 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 others
		1					8
					1	6	9
19	148	29	49		51	94	416
44	96	36	42		39	96	210
12	62	58	47		71	98	440
10	70	44			18	48	197
	32	8			2	9	30
	6	10			5	17	32
	3	2			5	11	2
	3				2	7	8
	6	6			4	7	
		2			3	4	2
9	102	18	74		15	101	159
	7	6			5	4	34
2	63	53	15		49	85	332
13	19	100	23		16	55	260
2		2					
		2			2	17	15
		2					
	1						
	11	7				9	9
	7	10			3	20	35
	10	16			6	13	17
1	18	10			6	20	55
18	18	10			5	22	60
	6	6			4	4	21
	3	1			1		
	15	4			3	7	21
		2					
							4
	52	38			16	55	222
	23	18			8	33	145
	2	4			2	2	26
5	36	7			8	9	94
2	6	3			4	2	21
	2	1			1	2	

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
1	62	05	100	22148	660	79		532
	62	10	040	55579	1417	607	38	685
	62	10	045	16653	571	363	16	154
	62	10	050	45395	1016	236	489	178
	62	10	055	26954	414	135	107	121
	62	10	060	15420	214	127	31	20
	62	10	095	44062	953	122	43	756
	62	15	055	12600	229	22	124	32
2	61	00	045	145448	4152	1701	8	1848
	61	00	050	123117	2856	1764		687
	61	00	055	88469	1348	616	3	476
	61	00	060	248383	4236	996	70	2633
	61	00	065	295691	6817	2559	23	3639
	61	00	070	66770	1862	511		1282
	61	00	075	50538	630	129		412
	61	00	080	59405	800	170		525
	61	00	085	11911	159	39		110
	61	00	090	6370	87	5		72
	61	05	050	48795	674	56		276
	61	05	055	73781	919	78	8	436
	61	05	060	224571	3322	486	33	2076
	61	05	065	216404	4544	1523		2271
	61	05	070	28205	512	30		420
	61	05	080	3220	14	5		3
	61	05	085	15710	110	17		52
	61	10	080	5390	24	3		2
	61	10	085	24068	234	78		4
	62	00	040	86142	2209	1203	3	627
	62	00	045	390802	10199	5625	29	3582
	62	00	050	173305	4422	3033	2	974
	62	00	055	39475	457	254		95
	62	00	060	38815	662	332		254

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 others
	4	3			4	4	34
	6	9			4	4	64
	5	3			2	2	26
	9	4			10	13	77
2	1	2			7	9	30
3	1	6			3	2	21
	13	2			4	4	9
	1				3	4	43
47	35	24	56	18	52	188	175
10	16	2	37	2	11	122	205
	37	22	21	4	11	68	90
5	68	42	46	24	31	150	171
19	99	48	29	26	49	100	226
	4	7	6	4	1	21	26
	3	9	9		4	34	30
	8	8	11	7	9	36	26
	1	1	2			6	
		2				4	4
	9	48	34	1	12	127	111
14	10	25	53	2	20	179	94
1	73	82	58	22	55	197	239
12	38	77	56	23	17	190	337
		13	4		1	10	34
		2					4
	1	2	5	1	4	15	13
	1		2	5		11	
	20	3	13	52	3	44	17
	25	75	25	10	9	83	149
33	70	83	13	26	34	439	265
11	27	19	58	9	10	198	81
	11	26	2	18	4	9	38
1	9	5	7	2	3	23	26

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
2	62	00	065	37631	748	294	1	389
	62	00	070	105204	2396	1397		875
	62	00	075	11497	137	20		98
	62	05	040	149910	4004	2251	13	1371
	62	05	045	238765	6027	3459	135	2012
	62	05	050	142022	3510	2056	235	986
	62	05	055	24910	457	273	35	104
	62	05	060	56925	901	450		348
	62	05	065	15067	282	73		190
	62	05	075	6305	61	25		31
	62	05	080	2760	19	2		17
	62	05	085	2880	52	9	1	40
	62	05	090	2880	21	9		11
	62	05	095	5796	92	7		82
	62	05	100	58692	1411	218	6	1110
	62	10	050	9280	22	4		15
	62	10	060	74674	1457	620	132	545
	62	10	065	3185	144	37	83	10
	62	10	085	2880	47	20		26
	62	10	090	17134	230	89	2	132
	62	15	055	12250	191	38	125	16
	62	25	055	9110	145	2	119	19
3	61	00	045	107082	1456	665	6	383
	61	00	050	194668	2772	1069	4	1097
	61	00	055	280665	4369	1772		1782
	61	00	060	279859	4411	1456		2365
	61	00	065	97940	1619	588		878
	61	00	075	46026	855	230		535
	61	00	080	27484	225	88		109
	61	00	085	45203	499	126		319
	61	00	090	24038	270	91		146
	61	05	050	89931	1380	438		684
	61	05	055	139069	1783	571		859

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
	4	6	2	14		4	34
	1	18	6	8	8	19	64
		2			5	4	8
	52	39	27	14	10	95	132
4	40	65	37	19	10	118	128
6	14	23	20	17	14	66	73
	4	7		4	5	8	17
30	3	16	4	3	5	12	30
	2	2	2			4	9
	1	1	3				
	1		1				
			1				
	1	1			1		
	13	2	2	5	16	9	30
			2		1		
	10	18	8	5	3	22	94
		1					13
	1						
	2					5	
			2		2	4	4
					1		4
3	21	35	41	6	16	50	230
10	10	77	58	3	19	71	354
6	23	61	82	16	18	127	482
11	16	33	63	30	21	104	312
13	3	10	12	4	5	21	85
2		12	2	4	2	4	64
		2	4	6	1	6	9
		4	6	1	5	8	30
	4	2	2	2	6	4	13
2	7	29	24	1	13	33	149
	14	22	43	6	11	65	192

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
3	61	05	060	325428	3713	1212		1758
	61	05	065	369091	6157	1917		3324
	61	05	070	42211	837	254		423
	61	05	085	2790	12	6		5
	61	05	090	9000	68	18		41
	61	10	055	21200	221	54		120
	61	10	080	8310	142	80		2
	61	10	085	68657	565	189		14
	61	15	085	11495	58	6		1
	62	00	040	251803	3966	1853		1193
	62	00	045	378826	5573	3109	23	1564
	62	00	050	274718	4516	2793	1	1241
	62	00	055	146289	2691	1665	1	810
	62	00	060	136360	1853	957	3	723
	62	00	065	15995	150	52	3	77
	62	00	070	27998	296	174		79
	62	00	075	16070	255	205		47
	62	00	080	19320	147	44		58
	62	00	085	5850	17	6		6
	62	00	090	29310	407	130		250
	62	00	095	58766	619	214	1	352
	62	05	040	142611	2233	937	155	737
	62	05	045	118417	1604	778	106	504
	62	05	050	23400	611	235	132	205
	62	05	055	18138	214	82	97	18
	62	05	060	184585	3548	1740	3	1542
	62	05	065	87350	1088	407	1	491
	62	05	070	9555	75	36		18
	62	05	075	12090	69	27		30
	62	05	080	2925	16	6		7
	62	05	090	5520	46	14		27
	62	05	095	78120	641	214	1	343
	62	05	100	2800	16	2		14
	62	05	105	2716	48	18		30

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
6	29	54	89	14	29	121	401
19	29	89	75	28	16	131	529
1	3	18	6	6	2	17	107
		1					
	4		2		1	2	
	7	2	4			8	26
	5	3	8	6		8	30
	27	10	46	47	4	96	132
	8	2	3	7		10	21
22	24	113	90	4	15	110	542
32	33	72	102	6	46	125	461
22	12	26	98	11	21	115	176
	10	21	35	3	7	46	93
2	7	14	26	4	7	29	81
	3		2	1	1	2	9
	6	4	2	3	4	6	18
	1	1			1		
		6	2	1	2	4	30
		1		1		2	1
	3	2	2	2	4	2	12
	5	4	2	8	5	2	26
2	22	21	58	6	17	65	213
8	9	13	27	4	7	33	115
	2	5	6		1	4	21
		2		1	1		13
	12	32	12	8	1	27	171
	8	14	8	6	6	19	128
	1	2		5		4	9
		2		2		4	4
		3					
					1		4
	7	4		1	7		64

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No. of books	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
3	62	10	040	104845	2331	1438	373	142
	62	10	055	22365	247	78	104	25
	62	10	060	37295	460	303	9	57
	62	10	085	2925	5	1		4
	62	10	095	6400	86	35		45
	62	10	105	9044	123	28	5	82
	62	15	040	25783	689	397	87	114
	62	15	055	12190	84	26	41	
	62	15	060	14330	167	44	81	8
	62	20	040	2380	38	28	7	2
	62	20	050	3330	21	6	3	
	62	25	035	16435	361	215	18	70
	62	25	040	3600	40	37	1	
	62	25	045	5970	47	24	8	2
	62	30	035	66528	1553	805	470	202
	62	30	040	3000	13	2	7	1
	62	35	030	1910	31		27	4
	62	35	035	6690	133	4	120	3
	62	35	040	11880	244	16	203	14
	62	40	030	30370	971	16	844	47
	62	40	040	2010	21	13		6
4	61	00	045	48413	639	175	25	292
	61	00	050	404387	7608	2121	328	4289
	61	00	055	734300	13370	3620	318	7864
	61	00	060	588437	13063	4697	287	6636
	61	00	065	46291	835	411		319
	61	00	070	14903	222	118		65
	61	00	075	226925	4525	1146	550	2039
	61	00	080	126847	2178	504		1364
	61	00	085	105233	1176	306		663
	61	00	090	82015	741	276		366

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Othere
1	20	38	37	20	14	60	188
1	2	2	2	3	2	2	26
	2	10	3	1	3	8	64
	1				1		4
	2	1			1		4
4	4	8	7	8	1	12	47
		2	1	4	2	4	4
		3	1	4	1	8	17
		1					
		3					9
		3	2			2	51
		1			1		
		3	3		3		4
	9	4	6			10	47
				2	1		
		1			1		4
		2			1		8
	1				8		55
		2					
5	13	21	11	1	3	12	81
15	46	92	74	8	22	58	555
5	207	121	142	14	36	108	935
5	158	132	90	22	47	106	883
3	12	24	4	2	2	15	43
	8	7	2	1	2	6	13
	32	326	21	18	16	125	252
	31	41	21	21	7	31	158
	6	16	22	8	6	12	137
	9	21	2	11	1	17	38

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
4	61	00	095	12650	115	36		63
	61	05	050	78215	1463	148		1161
	61	05	055	337437	4955	542		3826
	61	05	060	181983	2446	264		1840
	61	05	065	122383	1869	218		1286
	61	05	070	10430	139	24		90
	61	05	075	4780	45	3		39
	61	05	085	2398	5	1		1
	61	10	055	5100	60			31
	61	10	060	11342	356	208		80
	61	10	065	3150	35			34
	61	10	070	8400	186	57		79
	61	10	080	77388	1214	250		45
	61	10	085	5185	62	6		6
	61	15	040	3200	100	90	8	1
	62	00	040	21975	223	72		105
	62	00	045	128630	2478	790	630	643
	62	00	050	26213	595	323	25	155
	62	00	055	101171	2192	1029	227	655
	62	00	060	261598	4917	2349	323	1661
	62	00	065	37880	721	517	1	136
	62	00	070	68188	1157	533	91	354
	62	00	075	51069	985	345	237	290
	62	00	080	15635	317	82	156	46
	62	00	085	3150	15	7		8
	62	00	090	12865	73	7	10	46
	62	00	095	83845	1050	176	504	283
	62	05	045	17612	311	97		119
	62	05	050	22400	350	148	10	164
	62	05	055	18607	213	46	10	138
	62	05	060	10813	124	28	25	55
	62	05	065	50570	697	201	111	240
	62	05	070	23995	275	48	20	133

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
	4	5	4			2	1
	6	17	12	6	7	12	94
6	58	21	43	8	25	29	397
	32	11	20	2	24	10	243
	18	24	31	19	7	23	243
	1	3	2	1	1		17
	1		1		1		
		1	1		1		
	4	2	4			2	17
		5	6			2	55
			1				
	3	5	4	3	1	4	30
	41	38	125	32	2	37	644
	4	3	5	2		2	34
					1		
	5	10	2	2		6	21
61	44	33	23	5	6	21	222
		5	8			2	77
	28	26	29	5	5	17	171
22	42	65	50	11	13	35	346
1	2	18	2		2	8	34
	26	9	11	6	6	10	111
	8	17	2	4	5	17	60
	14	2	5	3	3	6	
	3	2			1		4
	21	17	2	6		15	26
	3	2	10		1	2	77
20		8					
6	2	7	2			2	
	4	6			2	4	
	7	10	13	2	3	8	102
	3	3	4	2	2	2	38

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
4	62	05	075	2100	5	2		3
	62	05	085	6600	81	4	15	60
	62	05	090	45180	457	16	106	300
	62	05	095	15440	85	5		60
	62	10	040	5280	50	8	5	8
	62	10	045	22400	217	80	35	78
	62	10	055	19310	199	107	33	46
	62	10	060	5680	29	5	9	12
	62	10	100	13200	249	39	165	21
	62	15	040	86632	2788	1768	583	203
	62	20	035	48545	946	470	288	40
	62	20	040	126000	3308	2118	352	500
	62	20	045	3080	66	36	20	9
	62	25	030	3120	39	18	12	2
	62	25	035	13275	290	138	94	14
	62	25	040	130553	3217	1645	986	273
	62	25	045	12510	138	84	20	8
	62	30	035	19990	383	188	111	33
	62	30	040	95703	2712	1421	659	440
	62	35	030	2400	4	1	2	
	62	35	035	58450	1211	25	1050	58
	62	35	040	28210	536	20	446	22
	62	35	045	3110	105	1	85	9
	62	35	050	3530	66	53		12
	62	40	040	3010	51	1	45	3
5	61	00	040	2990	36	16		14
	61	00	045	128468	2670	848	1	970
	61	00	050	387323	8565	2058	4	5567
	61	00	055	329819	7240	1397	6	5015
	61	00	060	170053	2373	631	3	1402

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
		1	1				
	5	7	2	2		2	17
	9	2	1		2	2	4
	2	3	3	2		2	17
21		3					
1	2	5	2		3		
		2			1		
	2	1	1	3			17
4	23	34	15	18	4	25	111
3	9	18	12	16	2	15	73
2	20	36	22	17	1	35	205
				1			
	2	3			2		
	2	2	2			4	34
	14	25	22		7	27	218
	6	5	1	5	3	2	4
	1	2	5	6	1	2	34
	21	18	11	1	1	25	115
					1		
	28	4	2	1	5	8	30
	3	1	1	2	5	2	34
					1		9
					1		
	2				1		
			1		1		4
	203	43	33	7	7	42	516
4	36	134	49	6	25	110	572
	58	98	50	11	10	104	491
	22	20	25	1	9	17	243

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
5	61	00	065	50993	727	248	8	326
	61	00	070	3500	4	2		1
	61	00	075	68956	1654	137		1379
	61	00	080	43065	688	91		524
	61	00	085	143830	1734	704		686
	61	00	090	62400	452	116		199
	61	00	095	16400	169	51		106
	61	05	045	3120	53	3		44
	61	05	050	159696	2940	528		1996
	61	05	055	402663	6230	788	2	4372
	61	05	060	756642	11525	784	1	8985
	61	05	065	35596	502	26		418
	61	05	075	37063	931	36		828
	61	05	085	15385	176	24		113
	61	05	090	2990	42	22		17
	61	05	095	3315	46	36		5
	61	10	050	3150	33			24
	61	10	055	23474	367	131		134
	61	10	060	12100	169	4		114
	61	10	065	11708	165	11		113
	61	10	075	3200	50	15	4	20
	61	15	055	9600	188		28	5
	61	15	060	6400	105	35	10	25
	61	25	060	3055	41	20		16
	62	00	040	18395	333	160		148
	62	00	045	224128	5413	3655	28	1139
	62	00	050	107093	2329	1465	5	522
	62	00	055	23479	330	120	1	156
	62	00	060	147411	2241	829	22	1152
	62	00	065	77089	1115	544	4	403
	62	00	070	36993	305	112		135
	62	00	075	111675	1693	620	3	541
	62	00	080	11580	167	40		102

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
	4	19	3	1	9	15	94
				1			
	11	10	10	1	2	10	94
	8	11	2	1	2	6	43
	4	91	17	2	3	65	162
	5	16	6	4	2	19	85
	2	2	1		2	4	1
		2					4
5	26	37	17	3	21	25	282
61	32	77	39	4	37	58	760
60	91	80	108	8	65	71	1272
1	2	9	3	3	2	8	30
	6	3	3	5	3	4	43
	2	2	2	2	1		30
	1	1	1				
				1			4
			4		1		4
	2	5	6	1	1	6	81
	2	4	2		3	2	38
	4	4	3	6	1	2	21
2							9
7		7				4	137
5							30
			3	2			
	1	14	2			8	
	31	52	29	3	12	37	427
	13	11	15	4	14	15	265
	5	13	2	1		6	26
3	14	23	15	1	5	19	158
	3	8	14	4	3	8	124
2	2	3	2	2	2	2	43
	18	26	9	1	5	21	149
	3	2	2	1		4	13

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
5	62	00	095	3220	29	7		7
	62	05	040	142979	3189	1598	657	618
	62	05	045	68870	1547	1042	35	334
	62	05	050	6110	83	24	2	51
	62	05	055	14625	228	71		118
	62	05	060	85909	1267	218	2	726
	62	05	065	43272	551	48		356
	62	05	070	2475	16			13
	62	05	085	25961	342	105		202
	62	05	090	10387	139	40		92
	62	05	100	3220	26	2		9
	62	05	105	6160	43	8	14	10
	62	10	040	103715	2285	1287	581	140
	62	10	045	30340	1176	800	205	63
	62	10	050	33981	527	272	50	160
	62	10	055	56878	936	380	34	433
	62	10	060	2400	20	9	8	1
	62	10	075	19200	186	18	30	77
	62	10	105	77661	1438	269	366	632
	62	10	110	145500	3835	904	574	2046
	62	15	040	205442	4176	2325	399	1043
	62	15	045	12800	219	10	25	25
	62	15	050	12800	182	5	35	35
	62	15	055	5440	70	39	16	8
	62	15	105	26400	299	33		237
	62	15	110	26400	349	39	74	224
	62	20	035	48680	928	569	71	138
	62	20	040	171367	5427	3791	543	602
	62	20	045	2860	169	96	6	11
	62	20	055	2750	61	41	11	6
	62	25	035	8195	304	177	45	50
	62	25	040	45270	1209	858	139	115

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
7		2	3		1	2	
4	5	25	27	7	6	29	213
	3	29	10	2		15	77
		1	1				4
	4	4	2		1	2	26
14	22	8	11	1	7	6	252
4	12	5	9	2	2	2	111
	1		2				
	3	10	3			2	17
		3	3		1		
3					3		9
		3	3	1			4
6	11	51	13	8	2	54	132
3	6	11	4	3	1	12	68
	5	3	2		1		34
	4	2	9	4	2		68
			2				
7		16				8	30
6	2	24	13	5	2	12	107
	12	19	24	11	1	31	213
5	6	32	40	12	10	27	277
5		5					149
15		7				4	81
		1	2				4
	2	2	1	3			21
	1	3	2	2			4
	4	15	9	2			120
4	14	38	42	13	2	19	359
			4			52	
		1	2				
	1	4	3	1		6	17
	4	10	8	4	1	10	60

월 Month	해 역 Area			낚 시 수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상 한 Quad.	위 도 Lat.	경 도 Long.					
5	62	30	040	3150	60	41		16
6	61	00	040	5300	26	19		4
	61	00	045	40465	312	63	11	165
	61	00	050	404750	6387	1398		3903
	61	00	055	510129	8703	2614	12	5212
	61	00	060	48923	656	261	3	298
	61	00	065	33826	545	151	4	331
	61	00	070	12200	202	61	2	111
	61	00	075	58080	743	215		425
	61	00	080	86495	816	187		494
	61	00	085	172395	2695	698	2	1554
	61	00	090	44310	629	102		469
	61	05	045	4925	54	33		20
	61	05	050	141464	2689	178	6	1785
	61	05	055	25572	370	72		261
	61	05	060	29274	484	31	1	363
	61	05	065	26982	315	30		237
	61	05	070	2700	37	5		10
	61	05	075	60794	1172	29	41	1051
	61	05	085	6325	170	33		106
	61	05	095	2600	21	3		14
	61	10	100	28236	551	118	111	285
	62	00	040	59171	945	361	26	412
	62	00	045	156179	2107	1086	1	783
	62	00	050	117645	2265	1338	6	666
	62	00	055	75613	1059	230	172	521
	62	00	060	132780	1762	515	15	978
	62	00	065	34199	349	119	5	169
	62	00	070	29323	357	94	1	228
	62	00	075	146509	2350	854	3	1311
	62	00	080	169042	1698	543	7	882
	62	00	085	115561	1599	504	18	559
	62	00	090	62182	858	199		572
	62	00	095	11580	130	15	3	110

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
			3				
		1	1		1		
	10	3	2		5	15	38
5	76	117	65	17	48	148	610
3	96	109	38	20	35	137	427
	9	15	7		5	15	43
	9	7	3	1	8	10	21
		2	2	2	1		21
3	4	19	7	2	8	17	43
2	11	21	8	2	8	19	64
10	7	80	32	2	10	65	235
	3	27	1		3	15	9
		1					
12	26	54	32	2	77	60	457
6	3	5	3	1	4	6	9
	11	4	10	4	1	12	47
	8	4	2	2	3	8	21
	1	1		20			
	8	6	13		7	8	9
	1		3		1		26
	1		1			2	
		3	1		5	2	26
	11	6	6	3	10	29	81
2	17	14	20	4	15	3	162
	14	7	13	10	30	19	162
1	8	19	8		2	21	77
	9	25	18	10	11	23	158
	4	4	5	2	1	6	34
	2	4	2		1	4	21
4	11	28	9	7	15	31	77
	20	29	16	13	2	37	149
8	15	12	13	3	22	21	124
	6	16	5	3	5	17	34
	2						

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	구 간 Quad.	위 도 Lat.	경 도 Long.					
5	62	05	040	291515	3908	1656	782	984
	62	05	045	94427	1427	504	8	687
	62	05	050	34890	520	67		374
	62	05	055	10270	95	73	5	10
	62	05	060	23675	177	64		74
	62	05	065	43531	663	276	1	318
	62	05	070	11483	97	22		49
	62	05	075	35246	285	61		163
	62	05	080	59508	793	286	5	428
	62	05	085	32386	415	97	39	230
	62	05	090	73137	836	272	2	502
	62	05	095	127247	1696	599	6	928
	62	05	100	35286	508	156	14	168
	62	10	040	40864	548	219	168	102
	62	10	050	6580	93	44	23	18
	62	10	055	5720	68	29		29
	62	10	065	3200	109	35	30	38
	62	10	095	9718	136	33	8	75
	62	10	100	33766	456	86	85	243
	62	10	105	63798	954	254	208	365
	62	10	110	126390	1771	321	368	939
	62	15	040	32744	424	249	66	65
	62	20	040	49538	1293	891	181	114
	62	25	040	2750	73	54	3	11
6	61	00	050	12995	53	20		
	61	00	055	28483	309	146		108
	61	00	060	312092	5056	1163	33	2781
	61	00	065	181148	2706	697	90	1475
	61	00	070	2925	79	54		22
	61	00	075	91143	1375	498		727
	61	00	080	118993	1745	710		864
	61	00	085	175590	2327	696	3	1349
	61	00	090	28989	331	75	1	209

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
2	44	61	24	16		83	256
	8	8	19	2	18	15	158
		44	2		10	23	
			2				
	1	13	3		1	8	13
	7	9	4			10	38
	2	5	1		3	2	13
	5	2	4	4		8	38
17	2	5	2	3	3	4	38
	3	10	2		4	4	26
	4	11	5		2	8	30
	15	25	10	6	3	27	77
		16	2	61	3	15	73
	4	10	2	5		8	30
		1	2	3	2		
	1	1	2			2	4
6							
	4	8	3		3	2	
	3	7	3		4	4	21
3	4	37	5	7	7	21	43
7	8	11	9	17	3	15	73
		4	3	7	2	2	26
	5	8	6	24	2	15	47
		1	3	1			
	1	4	7		2	6	13
	6	7	12		5	8	17
	315	94	112	13	116	96	333
6	38	54	86	1	35	62	162
	2	1					
	10	24	22		14	12	68
	10	19	31		28	19	64
	24	25	57	2	17	52	102
ɔ	9	4	10		1	8	9

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
7	61	00	095	2080	34	12		16
	61	05	045	19900	334	32		295
	61	05	050	17060	185	23		116
	61	05	055	2665	62	23		30
	61	05	060	171513	2376	214	2	1443
	61	05	065	193894	2627	414	9	1619
	61	05	075	5400	29	6		22
	61	05	085	4950	14	1		6
	61	05	090	3575	28	20		6
	61	10	050	6400	156	10	5	15
	61	10	055	6400	114	5	10	
	61	10	060	38400	694	74	50	65
	61	10	075	8460	113	39	22	46
	61	15	040	12800	170	32	8	10
	61	15	050	12800	420	25	211	7
	61	15	055	6400	114	12	20	30
	62	00	040	57294	662	308	36	203
	62	00	045	83183	775	274	3	362
	62	00	050	14330	60	15		19
	62	00	055	25165	381	190	3	136
	62	00	060	40102	622	228		271
	62	00	065	72586	1148	393	4	570
	62	00	075	95024	1155	429		592
	62	00	080	208320	3075	923	3	1853
	62	00	085	265548	3933	1547	1	2038
	62	00	090	262395	3726	1077	3	2236
	62	00	095	31704	500	122	2	319
	62	00	100	6500	80	52		20
	62	00	120	1800	72	20		50
	62	05	040	233504	2956	1386	610	693
	62	05	045	48102	559	291	18	207
	62	05	050	5850	199	117		73
	62	05	060	12390	164	64		78

가다랭이 SKJ	황 세 치 SWO	녹 세 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
		2					4
		3					4
		12	1		1	2	30
			3		4	2	
	93	55	123	8	77	96	265
	60	66	110	8	38	81	222
		1					
			1		2		4
			2				
1		1					124
3		2					94
11		7					487
			1	1			4
11		2					107
7		12					158
		1					51
	7	9	28		10	27	34
	13	18	23	2	8	25	47
	5	2	4		7	4	4
	5	4	14		8	8	13
	13	14	13		17	6	60
	27	12	30	5	10	29	68
	13	16	17	8	12	17	51
1	56	22	31	3	34	21	128
8	65	20	62	8	32	58	94
20	50	34	67	28	44	52	115
	15	8	3		3	2	26
	2	1	1				4
	1				1		
	93	27	17	5	40	17	68
	3	3	15		3	10	9
	2	3	3		1		
	1	2	1		9		9

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
7	62	05	065	18152	265	119		129
	62	05	075	115023	1660	559		941
	62	05	080	187769	2714	839	1	1640
	62	05	085	297939	4292	1427		2324
	62	05	090	370089	6325	1369	3	4407
	62	05	095	149000	1934	825	1	898
	62	05	100	22555	341	58	30	200
	62	10	045	6300	47	16	16	8
	62	10	050	9780	165	17	82	58
	62	10	055	9870	173	75	53	24
	62	10	060	3290	42	27		8
	62	10	065	5720	53	12	2	35
	62	10	085	38648	766	305		367
	62	10	090	30643	478	131	3	311
	62	10	100	2600	14	3	3	6
	62	10	105	3042	5	1	1	1
	62	10	110	8918	142	8	47	74
	62	15	050	5700	41	3	29	9
	62	15	055	6320	26	2	17	4
8	61	00	050	3250	60	15		40
	61	00	055	3500	25	6		9
	61	00	060	43975	513	192	2	236
	61	00	065	91800	1613	412	34	915
	61	00	070	2600	76	25		35
	61	00	075	119396	1942	486	4	1201
	61	00	080	56596	699	140	1	432
	61	00	085	37270	334	78		205
	61	00	090	138053	1758	458	10	1042
	61	05	060	33170	409	144		196
	61	05	065	81525	1137	146		806
	61	05	090	2912	12	1		11
	61	10	045	22400	315	85	21	13
	61	10	055	8400	89	46	18	23

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
		1	5		3	4	4
	19	15	30	4	7	25	60
4	34	15	41	13	19	31	77
1	28	42	116	27	28	90	209
5	80	32	127	5	43	92	162
5	35	18	35	2	17	25	73
	3	14			2		34
	1	1	1			4	
	2	2			4		
		2		5	1		13
2		1					4
	1	1			2		
	10	2	32	1	3	29	17
	4	1	13	1	4	6	4
		1			1		
	1	1					
	2	2			5		4
3							
	1	1			1	2	
	1		2		1	2	4
	2	19	10		3	2	47
4	6	43	37	3	8	6	145
		2	1				13
8	5	32	45	2	10	8	141
6	5	17	18		6	6	68
	2	7	9	3	4		26
	22	49	23	6	5	19	124
	2	1	22	2	4	4	34
	1	27	45	2	6	2	102
10		10				54	120
		1					4

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
8	61	15	035	9600	114	9	27	5
	61	15	040	19200	322	77	25	29
	62	00	045	11690	49	11	10	5
	62	00	050	3107	5	3		1
	62	00	055	57231	952	522	5	260
	62	00	060	81797	1110	422	18	535
	62	00	065	268545	3544	1526	24	1755
	62	00	070	151446	2016	857	6	973
	62	00	075	486692	7619	2654	14	4034
	62	00	080	338981	5313	1965	11	2743
	62	00	085	236990	2963	974		1646
	62	00	090	132511	1342	408	1	707
	62	05	040	257828	4025	1766	979	920
	62	05	045	19969	223	63	57	73
	62	05	050	44695	750	384	24	294
	62	05	055	304516	5144	3007	124	1687
	62	05	060	137141	1524	572	3	785
	62	05	065	188091	2520	920	3	1322
	62	05	070	46021	482	145		274
	62	05	075	152231	2063	518	11	1294
	62	05	080	49396	464	97	1	318
	62	05	085	116506	1533	565	1	754
	62	05	090	48406	500	122		303
	62	10	040	79210	1355	563	384	309
	62	10	045	2464	50	21	21	6
	62	10	050	100688	1617	596	439	503
	62	10	055	171905	2435	1324	293	652
	62	10	060	10889	83	36	8	31
	62	10	065	5200	61	16		38
	62	10	070	16905	242	63		150
	62	10	085	32057	575	257		193
	62	15	040	2530	16	1	7	4
	62	20	040	5020	86	9	66	3

가다랭이 SKJ	황 세 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
15		3				4	51
8		8				21	154
	1	1	7	3		2	9
	1						
	18	7	21	4	9	21	85
	12	25	16		4	10	68
13	27	62	62	16		25	34
	17	29	18	6		12	98
14	56	139	91	13	38	71	495
25	32	52	78	38	12	37	320
	12	31	72	22	12	10	184
	10	36	38	6	4	12	120
	28	39	38	2	28	37	188
	4		6		3	4	13
	2	5	5		4	2	30
	19	19	42	3	21	21	201
	13	8	32	11	6	17	77
9	15	16	48	10	13	19	145
2	5	8	11	3	2	6	26
15	14	17	32	6	11	17	128
	3	2	13	3	2	4	21
	13	10	53	7	4	15	111
	1	3	27		1		43
	10	17	13		4	8	47
					2		
	3	2	10		7	6	51
	6	7	25	28	11	8	81
	1	1				2	4
		1	2				4
	2	1	3		4	2	17
	8	5	24	14	4	6	64
			4				
	3				1		4

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	사각 Quad.	위도 Lat.	경도 Long.					
8	62	25	040	33650	1319	30	1138	68
9	61	00	050	2925	9	2		3
	61	00	055	29223	333	141		139
	61	00	060	362954	6057	2582	22	2750
	61	00	065	597727	11690	5476	85	5007
	61	00	070	27503	374	225		95
	61	00	075	120691	1682	453	4	1030
	61	00	090	34091	361	83		232
	61	05	050	18420	326	120		178
	61	05	055	123022	1773	434		1123
	61	05	060	165316	2509	505	1	1533
	61	05	065	98947	1519	528	2	797
	62	00	040	43285	488	68	1	321
	62	00	045	41966	433	120	20	196
	62	00	050	23530	287	145	3	84
	62	00	055	17818	156	87	3	30
	62	00	060	282673	4064	1712	23	1919
	62	00	065	129682	2085	820	6	1124
	62	00	070	86030	1131	377	10	602
	62	00	075	130767	1492	386	25	942
	62	00	080	59800	740	158		489
	62	00	085	100945	825	344	2	343
	62	00	090	181469	2001	800		1018
	62	00	095	62655	904	167		639
	62	05	040	217983	2600	969	193	1052
	62	05	045	284460	4048	1894	80	1711
	62	05	050	199275	3306	1622	123	1423
	62	05	055	182639	3259	1249	96	1721
	62	05	060	43435	687	242		394
	62	05	065	25656	560	270		259
	62	05	070	50355	531	222	15	228
	62	05	075	24840	293	73		184
	62	05	085	13615	167	50		97
	62	05	090	137895	1810	519	2	1076

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
	9	2	2	1	14	12	43
			4				
	1	9	7		2	4	30
	43	84	59	6	81	46	384
	87	241	64	8	92	81	549
	7	12	3		5	10	17
	2	13	14	6	31	10	119
		14	6		7	2	17
		9	1		12	2	4
	14	42	14	2	44	15	85
	23	28	49	6	55	27	282
	5	22	15	5	28	6	111
	3	3	10	2	21	4	55
	1	13	5	1		4	73
	4	4	7	1	7	2	30
	6	4	2	2	3	2	17
	31	50	26	4	43	21	235
	13	18	7	1	11	8	77
	8	7	5	6	26	12	78
	2	36	9	9	11	17	55
		26	4		8	4	51
	6	10	9	8	12	10	81
	14	43	11	15	5	27	68
	8	33	3	6	14	8	26
	29	31	26	4	70	25	201
	39	31	25	3	59	27	179
	15	20	12	1	1	12	77
	31	13	10	3	36	19	81
	7	9	6		4	4	21
	3	9	3		3	4	9
	4	7	4	3	8	10	30
	5	4	2	3	1	4	17
		2	1				17
	10	37	9	1	5	10	141

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
9	62	05	100	2800	18			12
	62	10	040	124808	1980	747	517	505
	62	10	045	64920	713	359	71	219
	62	10	050	8975	89	59	4	14
	62	10	055	39487	504	283	11	166
	62	10	065	2860	36	22		12
	62	10	070	16090	301	122		131
	62	10	090	2800	89	9		79
	62	25	035	28990	1124	46	978	50
	62	25	040	47720	2261	115	1936	99
10	61	00	050	15191	163	63		67
	61	00	055	36280	1535	262		1187
	61	00	060	16289	223	38		166
	61	00	065	215335	3726	1861	4	1522
	61	00	070	98441	1875	1036	1	563
	61	00	075	172559	3470	1492	1	1553
	61	00	080	28825	257	138		85
	61	00	085	5933	71	8		27
	61	00	090	8970	235	60	5	105
	61	05	055	11128	148	30		83
	61	05	065	26876	342	95		188
	61	10	050	6400	97	6	15	10
	61	15	070	22400	359	70	32	27
	62	00	040	26870	198	80		81
	62	00	045	12996	148	43		65
	62	00	050	136454	2154	1033		774
	62	00	055	101602	1402	728		531
	62	00	060	73229	849	205		526
	62	00	065	40357	740	278	4	419
	62	00	070	39550	602	139		423
	62	00	075	24055	295	151		92

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
	1	3				2	
	15	31	14	2	27	15	107
	2	5	4		8	4	41
		3	2		7		
	1	3	5	4	12	2	17
	1		1				
	5	3	3	2	2	12	21
	1						
	5	1	1	3	17	6	17
	26	3	1	5	41	12	23
	1		15				17
	3	2	35		2	10	34
	5		2		4		8
	31	16	69	4	9	56	154
		43	32		3	142	55
11	8	3	102	3	20	8	269
		1	10			10	13
		1	2	1		2	30
	15	1	7			8	34
	2	1	2		2	2	26
		2	14	2	3	8	30
4						2	60
11		2				8	209
	2	2	8	2		2	21
	2	2	13			2	21
	17	7	40	4	13	44	222
	14	8	20	4	2	35	60
4	4	13	9		4	46	38
1	11	2	2		2	8	13
	4	1	6	3	3	6	17
	1	1	5		5	6	34

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
10	62	00	080	5400	30	4		23
	62	00	090	6400	55	25		30
	62	00	095	3360	24	8		14
	62	05	040	158618	3007	1223	170	1306
	62	05	045	58083	801	365	3	316
	62	05	050	792833	14041	7873	34	4940
	62	05	055	835480	14665	7187	17	6203
	62	05	060	168783	2494	833	9	1329
	62	05	065	98536	1248	538	5	596
	62	05	070	10620	126	32		73
	62	05	075	5850	26	12		12
	62	05	085	33600	594	96		479
	62	05	090	38810	677	155		483
	62	05	095	34018	512	122	5	346
	62	10	040	94205	1747	806	393	325
	62	10	050	122187	1964	713	105	980
	62	10	055	29864	399	204	15	157
	62	10	065	62933	852	281	3	459
	62	10	070	13545	213	61		118
	62	10	085	33600	732	89	1	593
	62	10	095	11652	226	61	46	107
	62	10	100	18820	343	50	56	215
	62	15	055	3055	31	8		17
	62	25	035	20190	655	47	540	34
	62	30	035	15660	385	26	319	20
11	61	00	050	74773	1211	300		776
	61	00	055	9036	126	17		99
	61	00	060	2925	18	7		6
	61	00	070	11540	136	83		52
	61	00	075	53073	944	395	1	290
	61	00	080	4590	72	28		30
	61	00	085	22755	551	90		372

가다랑어 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상어 Sharks	기타새치 OTB	기타 Others
		3					
			2				
	27	35	42		13	37	154
	5	3	23	2	4	12	68
1	109	29	153	48	45	156	653
	113	35	215	25	40	177	653
	22	6	51	49	4	37	154
	5	4	23	5		25	47
	1		3		4		13
			2				
	2	2	1	2		8	4
	5	2	8	1		2	21
6	2		5	3	6		17
	27	6	25		10	27	128
4	4	4	10	3	11	19	111
	2			2	2		17
	5	1	22	2	5	6	68
		1	2	1	2	2	26
	3	2	2	1	3	8	30
4	2	1	1				4
5		1	3		3	2	8
						2	4
	13	1		1	2		17
	5				2		13
	15	12	21	2	18	29	38
	2		2		2		4
					1		4
		1					
	4	4	53		26	19	52
			7		3	2	2
		8	21	1	7	17	35

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
11	61	00	090	14940	153	26		63
	61	05	050	2925	21	1		9
	61	05	090	9090	43	11		19
	61	10	055	9600	269	125	1	130
	61	15	055	3200	30	17	1	12
	61	15	060	6400	133	55	2	57
	62	00	040	93383	1765	533	2	1065
	62	00	045	10940	94	41		26
	62	00	050	74073	1164	613	10	424
	62	00	055	82641	950	396	35	395
	62	00	060	21923	402	169		210
	62	00	065	13163	162	47		103
	62	00	070	9670	91	35		51
	62	00	075	6071	31	12		17
	62	00	080	12558	97	51		39
	62	00	085	12514	167	55		107
	62	00	090	24850	318	48		258
	62	05	035	2900	9	3		5
	62	05	040	489945	10071	4991	12	4247
	62	05	045	354542	6460	2903	3	3052
	62	05	050	504774	8298	4948	6	2741
	62	05	055	238181	3224	1533	1	1508
	62	05	060	8725	71	38		25
	62	05	065	15640	172	46		111
	62	05	070	12441	179	25		125
	62	05	075	2964	20	3		15
	62	05	080	6175	25	2		16
	62	05	085	19560	121	9		94
	62	05	090	38774	539	86	6	419
	62	05	095	60793	1518	200	33	1205
	62	05	100	9360	302	34	12	247
	62	10	040	34375	745	487	3	218

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
		10	9		4	8	33
	2		4		1		4
		2	4		1	2	4
		2					11
		15					4
	16	39	21	1	18	19	51
	1		6		3	17	
	13	19	27	9	7	21	21
	8	46	18	6	4	12	30
		4	8		1	6	4
		7			1		4
		2	3				
			2				
	1	1	3			2	
		1	2			2	
	4		2			2	4
			1				
	89	195	132	5	65	144	191
	77	54	111	3	37	92	128
	102	70	118	8	49	123	133
	59	22	32	3	9	31	26
		1	4			2	1
	2	3	2	3	1		4
	3	9	4				13
		1		1			
	1	2	1		3		
	3	5	1		1	4	4
	5	13	2		2	2	4
	9	14	11	1	2	17	26
	1		4			4	
	11	4	8	3	1	6	4

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
11	62	10	045	21670	517	321	5	157
	62	10	050	158863	2324	811	20	1368
	62	10	055	182547	3297	816	178	2168
	62	10	060	5880	52	7	26	4
	62	10	070	8892	110	7		85
	62	10	080	12350	138	28	1	100
	62	10	085	42000	784	59	1	695
	62	10	090	45046	1035	120	72	802
	62	10	095	99126	2252	309	177	1658
	62	10	100	89610	2153	127	182	1722
	62	15	045	12800	295	162	15	99
	62	15	055	32320	605	208	343	20
	62	15	060	2430	30	9	18	1
	62	15	065	2590	17	12		2
	62	20	055	2960	36	1	32	
	62	20	060	22440	236	93	24	102
	62	20	065	5430	52	7	41	1
	62	20	090	2700	26	4		21
12	61	00	045	27831	311	39	66	50
	61	00	050	194114	3203	613		2143
	61	00	055	50177	663	236		286
	61	00	060	31013	239	35		149
	61	00	065	2925	13			8
	61	00	075	3120	84	6		66
	61	00	085	5760	26			16
	61	00	090	2700	74	15		48
	61	05	050	2700	20	1		13
	61	05	055	17420	99	5		55
	61	05	060	27130	110			82
	61	05	065	15440	320	4		259
	61	10	060	9400	73	10	15	25
	61	10	065	9600	133	10	30	45

가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
	3	9	2		1	2	17
	13	16	15		11	15	55
	24	18	24	3		17	49
		2	2		3	4	4
	2	1	2				13
	2	3	2			2	
	5	9	4	5	2	4	
	12	10	7		2	6	4
	16	36	14		6	19	17
	15	36	19		6	25	21
			7			6	6
		5	4	4	4	4	13
	1	1					
		1	1	1			
					3		
		3					14
		1	1		1		
	1						
14		14	4	1	6	6	111
	42	33	83	1	119	122	47
6		18	21		39	31	26
	9	5	5		30	6	
					5		
	4	6			2		
		10					
		5	2		2	2	
		6					
	9	3	8		9	10	
	7	3	4		8	6	
	2	15	6		17	17	
10		5					8
7		3					38

월 Month	해역 Area			낚시수 No. of hooks	계 Total	황다랑이 YFT	날개다랑이 ALB	눈다랑이 BET
	상한 Quad.	위도 Lat.	경도 Long.					
12	61	15	055	38200	625	75	102	80
	62	00	040	75142	728	188		458
	62	00	045	93582	1107	405	3	562
	62	00	050	91228	1595	599		700
	62	00	055	23271	265	69		136
	62	00	065	29220	368	75		247
	62	00	070	86054	1726	850		709
	62	00	075	11280	288	73		199
	62	05	040	301720	5980	3306	7	2349
	62	05	045	218945	3675	1597	2	1780
	62	05	050	192998	3034	1616	1	1166
	62	05	055	19425	221	106	1	93
	62	05	065	17280	354	151		190
	62	05	070	32185	315	142		123
	62	05	075	3080	31	6		18
	62	05	085	3080	28	9		13
	62	05	090	11695	192	62		125
	62	05	095	199438	3043	661	50	2144
	62	05	100	55637	881	186	10	637
	62	10	040	118725	1631	798	14	683
	62	10	045	47495	575	291	11	218
	62	10	050	153436	3211	891	50	2018
	62	10	055	81915	1002	215	5	710
	62	10	075	3080	36	9		24
	62	10	090	12105	218	34	23	157
	62	10	095	217577	3757	533	324	2576
	62	10	100	177650	3116	484	162	2285
	62	10	105	13195	208	60	5	135
	62	15	040	21060	429	299	4	76
	62	20	040	132490	2757	1855	105	463
	62	25	035	1990	17	8	8	
	62	25	040	10850	104	24	70	4
	62	25	045	8900	123	75	26	7

가다랭이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
23		25					320
	18	19	13		5	23	4
	14	17	23	2	28	40	13
	4	33	21	3	30	154	51
	1	4	12	1	4	17	21
	8		8	1	19	10	
1	23	39	22	5	40	37	
	2	2	4	1	1	6	
	35	89	51	3	43	67	30
	40	105	32	10	35	27	47
2	32	38	41	12	41	77	8
	5	5	2	1	2	2	4
	3	1	2		3	4	
	13	6	12	2	5	12	
		7					
		3	2		1		
	1	3	1				
3	27	41	21	6	20	44	26
4	8	10	3		15	8	
	16	44	14	11	9	42	
	4	13	6	5	10	17	
	24	59	32	4	34	48	51
	13	5	12		17	17	8
		3					
	1				1	2	
1	38	59	19	1	7	37	162
1	35	48	11	2	24	21	43
	6	1	1		1		
	4	5	2	6	1	6	26
	22	149	16	29	17	58	43
			1				
			3	1	2		
	1	3			11		

太　　平　　洋

Pacific Ocean

太　　平　　洋

Pacific Ocean

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
1	61	00	145	50640	2122		1458	
	61	00	155	15600	387		310	
	61	00	160	34870	755	75	391	147
	61	00	165	15120	222		161	5
	61	00	170	25279	387		164	2
	61	00	175	121377	2227	81	1149	193
	61	05	170	2640	26		16	
	61	05	175	27232	482		318	7
	62	00	160	19638	558		463	
	62	00	165	5852	60		19	
	62	00	170	2472	50		30	
	62	00	175	22100	236		99	
	62	05	160	12683	218		154	8
	62	05	165	12360	241		106	55
	62	05	170	56490	1078		211	524
	62	05	175	22660	214	69	28	82
	62	10	165	41220	749		111	500
	62	10	170	5200	63		12	36
	62	10	175	19580	233		34	151
	62	15	165	12180	299	75	85	62
	62	15	170	10717	167		29	125
	62	15	175	55707	838		127	565
	62	20	175	21810	397		69	281
	62	30	170	1550	41		5	25
	63	00	120	2400	81			68
	63	00	140	37960	890		238	
	63	00	145	42835	882		160	2
	63	00	150	26558	319		157	4
	63	00	155	108808	1906		450	19
	63	00	160	56890	801		235	26

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
545		13	2	5	13	12		74
68		4		5				
123			9	1	2	1		6
49		1		1				5
191		3	3		6	2		16
711	36	4	20	20	2	5	6	
10								
98	50		5	4				
77	8	1	7			2		
15	26							
8	10		2					
115			15					7
53		1	2					
54	20		4		1	1		
261	34	1	17	7	7	1		15
26		2		7				
87			11			1		39
4			5		4	2		
36			1	4	2			5
50			2	1		4		20
4		1	3			4		1
37		1	41		9	58		
18		1	9			17		2
9				2				
6	3			3		1		
602	19	9	9	5	1	4		3
617	52	5	7	6	12	4		17
134	1	2	14	3		3		1
1309	47	6	50	6	6	2		11
409	53	9	23		9	4		33

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
1	63	00	165	109306	2287		1521	45
	63	00	170	58170	947		394	109
	63	00	175	17574	185		90	2
	63	05	125	2410	13		3	2
	63	05	130	2400	18			5
	63	05	135	16980	313		17	6
	63	05	140	13126	308		25	41
	63	05	145	39532	738		136	318
	63	05	150	7402	134		12	40
	63	05	155	7540	144		6	83
	63	05	160	58554	1061		434	370
	63	05	165	36934	589		404	84
	63	05	170	66115	1217		994	19
	63	05	175	70620	2021		1480	183
	63	10	125	13420	226			124
	63	10	130	51273	755		17	435
	63	10	135	28070	591		7	395
	63	10	140	36696	695		26	247
	63	10	145	26128	473		40	235
	63	10	150	2520	32		4	24
	63	10	160	4550	75		15	52
	63	10	165	7345	44		9	29
	63	10	170	7000	96		23	60
	63	10	175	4800	76		21	36
	63	15	120	42136	999		17	852
	63	15	125	23322	389		14	281
	63	15	130	41705	638		12	465
	63	15	135	7305	28			16
	63	15	165	2275	23		2	20
	63	15	170	28066	743		84	583
	63	15	175	36090	641		162	412
	63	20	120	75482	1360		41	973
	63	20	125	62901	1281		26	1043
	63	20	130	8765	103		3	71

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
613		11	36	7	12	7	4	31
372			32	1	4	5		30
81			4					8
8								
12			1					
271		1	1	1	7	2		7
173	2		2			54		11
205	8	1	11	12	3		5	39
59	2		1		2	1		17
34	6		2	6			5	2
181	4	2	4	18	5	8	16	19
46	6	4	1	5	4	3	2	30
130		8	7		5	8		46
254		3	12		1	9		79
76	4	4	6			7		5
241	5	4	21	9	2	9	4	8
152		3	10	9		1	5	9
366	1	6	7	6	1	14		21
135	1		15	5	3	3		36
2			2					
8								
5		1						
8			2					3
12			3		2			2
62	2	9	6	14	4	10	12	11
47	8		4	6	1	23		5
95		2	17	5		1	4	37
10			1					1
		1						
39		2	10	18	5			2
34			10	7		3	3	10
125		12	71	32	26	33	20	27
79		12	18	26	17	30	15	15
8			11	7	2			1

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
1	63	20	170	3960	87		12	59
	63	20	175	32360	689		94	557
	64	00	155	24698	350		200	
	64	00	160	244039	5840		4088	7
	64	00	165	520635	8726		5328	13
	64	00	170	260410	5634		3447	23
	64	00	175	83304	1568		850	3
	64	05	080	40400	971		55	
	64	05	155	7260	54		12	
	64	05	160	5858	82		51	
	64	05	165	33745	537		294	
	64	05	170	10200	295		197	1
	64	05	175	13180	216		133	
	64	15	135	14625	173		11	
	64	20	130	17310	410		14	17
	64	25	130	14495	282		6	33
	64	25	135	5655	173		3	35
	64	25	140	15972	402		34	220
	64	25	145	2535	161		4	127
	64	30	140	18643	1260		11	953
	64	30	145	50435	2656		26	2260
2	61	00	145	46000	2129		1833	4
	61	00	150	48199	872		695	1
	61	00	155	197547	3057		2116	18
	61	00	160	133068	1483		1006	11
	61	00	165	36685	533		405	5
	61	00	170	5805	60		11	4
	61	00	175	8418	209		136	2
	61	05	155	15747	560		499	
	61	05	160	21355	296		215	

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
12			2	2				
16		1	1		2	17		1
136			9	2		3		
1489	40	9	89	10	5	12	6	85
3088		27	148	17	5	22	19	59
2008		8	89	24	4	6	16	9
683		2	20	10				
				14	885		7	10
40			1	1				
27			2		1	1		
222		3	14	1	1	2		
95			2					
69			13	1				
99	7			1				55
199	4	1		2				173
104	2			1				136
64				1				70
143			1	4				
30								
289				6	1			
359				8	3			
215		10	2	2	3	4		56
143		1	12	5	4	2		9
634		4	56	20	13	2	1	193
378	20	8	44	6	2	1	2	5
114		1	5	1	1	1		
35								10
64		1	4		1			1
53		1	5		2			
75		1	4	1				

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
2	61	05	165	6600	51		48	
	61	05	170	6480	212		160	13
	62	00	150	34769	536		422	2
	62	00	155	308179	6363		4788	128
	62	00	160	193775	3602		3078	10
	62	00	165	34832	698		578	5
	62	00	170	5912	48		15	2
	62	05	155	2700	31		21	
	62	05	160	8456	81		32	13
	62	05	165	8244	182		95	11
	62	05	170	2976	21		1	16
	62	05	175	9492	222		20	88
	62	10	155	5200	87		26	54
	62	10	160	5200	46		11	17
	62	10	170	7690	91		13	75
	62	15	105	2500	40		14	16
	62	15	160	13000	215		62	118
	62	15	165	32720	523		162	278
	62	15	170	12900	259		59	152
	62	15	175	28136	518		117	235
	63	00	140	37550	705		114	10
	63	00	145	3186	4		1	
	63	00	150	18165	439		191	2
	63	00	160	59395	1562		1186	1
	63	00	165	46765	521		280	19
	63	00	170	23040	206		58	32
	63	00	175	15580	449		287	6
	63	05	130	14880	457		360	1
	63	05	135	58760	1144		146	79
	63	05	140	9330	100		65	22
	63	05	145	13565	259		111	26
	63	05	150	60666	939		160	306

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
3								
17		1						21
83		2	9	2	14	2		
1276	14	3	111	19	8	4	1	11
389		4	62	20	10	3	1	25
107		3	3			1		1
7			3					21
6			3			1		
17			10			5		4
25	43		1		5	2		
			4					
70	40	1			2	1		
7								
11			2			3		2
2			1					
5			3		2			
26			6			3		
57			7			5		14
6			11			7		24
129			9	2	13	2		11
526	20	4	9	8	3	2	1	8
2			1					
227			17	2				
247	61	9	11	2	9	2		34
138	52	3	12	4	2	3		8
91			3	7			1	14
141	2	1	8	3	1			
78		5		2				11
882		7	6	2	3	2		17
6		3	2	1				1
91	12			2	1	6		10
374	1		13	10		20	6	49

월 Month,	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
2	63	05	155	31569	452		50	188
	63	05	160	62545	1256		430	323
	63	05	165	55889	737		438	120
	63	05	170	108040	1757		792	463
	63	05	175	63274	975		422	205
	63	10	135	48470	835		23	566
	63	10	140	53141	1247		65	857
	63	10	145	6840	118		5	80
	63	10	150	3990	27		1	18
	63	10	155	3107	10			6
	63	10	165	7376	74		10	55
	63	10	175	9068	85		13	55
	63	15	120	3230	25			15
	63	15	165	4462	56		1	44
	63	15	170	65906	1286		197	940
	63	15	175	30182	380		97	209
	63	20	125	2115	15		1	3
	63	20	150	2989	18			10
	63	20	165	14400	135		4	118
	63	20	170	14400	355		101	238
	63	20	175	28592	506		164	295
	63	25	155	2275	12		2	3
	64	00	150	28104	887		468	
	64	00	155	31654	728		315	
	64	00	160	24364	583		438	
	64	00	165	72560	1366		556	101
	64	00	170	87163	1463		749	1
	64	00	175	31740	694		409	3
	64	05	080	57050	980		19	
	64	05	150	55518	1425		702	9
	64	05	155	35325	695		411	
	64	05	160	111042	2236		1492	

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
168			2	11		10	6	17
433		10	19	9	5	3	6	18
89		16	3	6	8	2		55
389		7	55	6	8	4		33
184	110	10	10	5	10	3		16
200		4	7	15		3	1	16
240	4	2	8	18	3	10	6	34
14	1		1	5	2	2	1	7
4				3		1		
				4				
4			4		1			
14			1	1	1			
3				1	5	1		
6			3					2
92			23	8	2	5	2	17
65			2	4		1		2
			8	1	2			
6			2					
13								
10			6					
33						3		11
5			1	1				
408			7	1		3		
356		6	14	4		5		28
112	5	1	17	2		1		7
498	25	7	30	8	2	3	2	134
603	20	2	25	5		2		56
252	12		13		1			4
1				21	932		5	2
654	19	1	22	5	4	4		5
260		8	1	1		1		13
682	12	4	28	4	1	2		11

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
2	64	10	085	2250	21			
	64	30	145	7492	292		7	231
3	61	00	140	11952	167		133	
	61	00	145	96165	1645		997	
	61	00	150	234528	4116		3200	
	61	00	155	186684	3265		2479	4
	61	00	160	258188	5613		4124	12
	61	00	165	10926	86		60	
	61	00	170	5805	64		32	
	61	00	175	35600	467		284	
	61	05	135	5808	29		23	
	61	05	140	22330	272		195	
	61	05	145	2585	35		1	
	61	05	150	20292	257		204	1
	61	05	155	23188	309		235	1
	61	05	160	3248	32		17	
	61	05	165	15176	235		150	
	61	05	170	7784	86		38	
	61	05	175	15310	247		178	
	61	10	135	2820	28		12	
	61	10	140	3380	49		32	
	62	00	150	3055	28		25	
	62	00	155	187136	3863		2696	107
	62	00	160	149305	2360		1618	29
	62	00	165	25364	294		198	
	62	00	170	10578	81		41	5
	62	00	175	83793	1448		982	93
	62	05	155	11391	195		119	
	62	05	160	5904	144		89	21
	62	05	165	7872	152		72	35
	62	05	170	13776	303		61	175
	62	05	175	54105	694		71	441

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
1				18			2	
51				3				
32			2					
239		2	36	2	7	8	2	352
681	46	20	76	2	15	9	2	65
566	50	11	56	3	6		3	87
1105	179	10	69	3	10	20	2	79
14		1	5	1				5
22								10
141	24	1	6	1	3			7
5				1				
63		1	7	2	4			
1			1					32
45			5	1				1
58		1	13	1				
15								
75		1	9					
43			4		1			
66		1	2					
10					1			5
15		1						1
3								
636	150	18	92	9	86	10	15	44
455	43	13	77	4	34	5	9	73
65			5	3	1			22
26	7		1			1		
317	6	3	3	10	2	4	20	8
56			8		12			
29			4		1			
43			1	1				
60			4	3				
159		1	8	3	1	2	7	1

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
3	62	10	145	2600	34		27	5
	62	10	150	31200	849		109	645
	62	10	160	4568	65		18	29
	62	10	165	7872	142		23	57
	62	10	175	6648	81		16	31
	62	15	145	7800	212		178	13
	62	15	150	13000	779		97	631
	62	15	160	18200	240		82	92
	62	15	175	7020	77		13	32
	62	20	160	5200	60		15	22
	62	20	165	12780	443		375	47
	62	20	170	5200	80		19	35
	62	20	175	7670	76		17	50
	63	00	105	2964	23		8	
	63	00	150	27049	367		167	46
	63	00	155	11260	94		48	7
	63	00	160	44794	1096		928	20
	63	00	165	17634	185		63	13
	63	00	170	9126	57		12	
	63	00	175	105443	1658		535	497
	63	05	135	10220	116		13	16
	63	05	140	3600	51		39	
	63	05	145	18520	231		17	47
	63	05	150	84621	1407		138	391
	63	05	155	10447	105		13	59
	63	05	160	42330	658		133	311
	63	05	165	9280	316		155	93
	63	05	170	42345	452		134	174
	63	05	175	132499	2469		490	1215
	63	10	170	7360	51		15	23
	63	10	175	13100	113		16	70
	63	15	170	10400	110		43	58

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
			2					
49			16			30		
13			2	1		2		
58			3	1				
30			1	2	1			
1			3			17		
28			4			19		
7			7			52		
25				2		2	3	
4			1			18		
3		2	4	5	1	4		2
4			3			19		
3		2				1		3
15								
112	6	3	8	4	2	6	9	4
26		1	1	2		4		5
107		9	1	2	4	8	4	13
85	2		6	2	1	2	2	9
15	10		1			1		18
413	7	3	30	4	2		6	161
83			4					
9		1				2		
160		1	4			1		1
833		3	16	5	1	10	10	
16	4		2	2	2	2	5	
159			3	10	2	21	15	4
36		1	1	1		27		2
93	2	8	6	5	4	2		24
586	12	8	23	6	5		10	114
8			5					
21			2			2		2
4		2						3

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
3	63	15	175	4920	32		4	22
	63	20	165	48010	835		279	433
	63	20	170	118101	1799		654	842
	63	20	175	25220	233		100	108
	63	25	165	6900	324		2	312
	63	25	170	6300	224		2	215
	63	30	155	2800	11		4	5
	63	30	160	3780	14		5	6
	63	30	170	6600	404		12	388
	63	35	140	14586	571		1	555
	63	35	150	2674	28		2	22
	63	35	155	2800	9		3	1
	63	40	145	22514	374			362
	64	00	145	30940	603		405	
	64	00	150	52865	850		472	
	64	00	155	39596	596		312	1
	64	00	160	9204	46		25	
	64	00	165	20085	316		160	
	64	00	170	37490	702		331	
	64	00	175	15140	169		86	2
	64	05	150	2924	38		13	
	64	05	155	2964	39		8	
	64	05	165	8775	202		55	
	64	05	170	2925	28		16	
	64	10	085	11400	130			
	64	10	090	38900	1399		2	
4	61	00	145	44450	519		299	
	61	00	150	207531	2737		1904	15
	61	00	155	123140	2147		1645	

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
6								
72			24		19	2		6
217			61	2	6	7	4	6
15						5		5
			2			1		7
		5						2
				2				
1				1		1		
		1	1					2
7		1	1	2		4		
3						1		
3				1		1		
4				1		3	4	
165	10	5	3	2	5	8		
346			22	2	1	7		
251	20		9		1	2		
18			2	1				
147		1	3	2			1	2
231	6	2	12	2		1		117
43	3	1	4	2	1	1		26
25								
29			2					
140				1		3		3
6				2				4
				30	27		73	
				5	1379		6	7
93	22	7	13	7	7		4	67
498	28	16	51	7	27	1	7	183
343	63	14	38	3	16	2	4	19

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
4	61	00	160	128757	2377		1701	4
	61	00	170	3150	35		27	
	61	00	175	19053	164		114	
	61	05	145	42025	429		220	1
	61	05	150	35168	438		258	87
	61	05	155	67737	691		433	2
	61	05	170	12125	134		73	
	61	05	175	61770	631		323	7
	61	10	140	20640	256		168	1
	61	10	145	17190	315		258	5
	61	10	150	20520	238		133	8
	62	00	145	5750	46		18	
	62	00	155	32627	303		193	
	62	00	160	25126	514		382	12
	62	00	165	11740	228		186	1
	62	00	170	35260	396		239	6
	62	00	175	108097	2029		995	179
	62	05	140	5650	96		74	
	62	05	150	3150	34		29	
	62	05	155	41542	647		378	22
	62	05	160	2730	55		38	1
	62	05	165	8220	194		31	106
	62	05	170	23450	464		151	225
	62	05	175	67850	1288		466	378
	62	10	125	1968	39		10	20
	62	10	155	35421	879		461	304
	62	10	160	36056	1149		694	191
	62	10	165	23400	590		110	260
	62	10	170	3936	91		33	45
	62	10	175	17583	467		147	251
	62	15	170	15600	356		153	159

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
578	21	3	50	2	2	5		11
7			1					
47			2		1			
120	30	1	13					44
50			15	3	12			13
215		4	24	4		1		8
56	1		2	2				
266	11	1	16	3	2			2
62			9	1				15
36			9		4			3
61			8		3			25
27				1				
64	5		16	3	4	1	2	15
92	10	2	10		4	1		1
34			7					
82		2	7	2	1	2	3	52
512	27	10	32	8	7	2	8	249
21				1				
5								
182			18	5	31	1	5	5
14				2				
47			5					5
59		1	13					15
389	14	8	25	3	3	2		
8			1					
87			9	2	9	1	6	
189			14	6	16		6	33
166			11			11		32
11			2					
54		1	4	4	1		5	
22			4			4		14

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
4	62	20	155	2600	50			41
	62	20	160	13050	227		36	148
	62	20	165	20530	398		104	245
	62	25	160	18250	298		23	212
	62	25	175	4861	28		17	9
	62	30	150	5300	199		6	182
	62	30	155	41460	1411		35	1197
	62	30	160	5566	122		3	96
	62	30	165	2789	38		6	22
	62	30	170	2520	56			45
	62	35	150	5300	199		74	106
	62	35	155	45009	1856		20	1693
	62	35	160	1800	18			11
	62	35	170	4560	615		3	601
	63	00	145	2924	23		12	4
	63	00	150	19042	189		77	
	63	00	160	51704	1147		956	
	63	00	165	46408	1425		758	369
	63	00	170	9164	165		58	23
	63	00	175	10140	175		103	12
	63	05	140	21140	647		137	283
	63	05	145	42420	1191		138	459
	63	05	150	11315	129		23	35
	63	05	160	20220	298		231	
	63	05	165	59810	1564		1215	75
	63	05	170	80834	2209		1153	525
	63	05	175	75962	1765		510	657
	63	10	160	3094	55		42	
	63	10	175	36645	883		269	476
	63	15	125	5100	60		8	25
	63	15	170	2280	31		3	27

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
2			2			1		4
18	2	3	2	3	3	3	2	7
15	1		8	3	1	6		15
24		3	3	3	1	7	3	19
1								1
5			1			5		
80		1	18	2	1	76	1	
10			6					7
1			2					7
8						3		
11		2		1				5
100		3	11	1		9	2	17
4								3
1			1					9
5			2					
107			3			2		
127		8	3		6	2		45
261		1	13	2	2	3	1	15
30		1	1	1		1		50
46	11		1	1		1		
204			18		2			3
528			28	3	17	3	4	11
61			6			4		
36		10			2	3		16
210		10	6		10	4		34
184		13	18		2	3		311
312	13	2	19	2	2	2	2	244
9			2	2				
111		3	4	3	1		3	13
4			2		19	1		1
1								

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
4	63	20	155	16020	180		35	103
	63	20	160	5100	73		20	42
	63	20	170	11760	157		33	107
	63	20	175	2400	35		8	18
	63	25	145	8280	394			384
	63	25	150	28500	924		4	881
	63	25	155	23650	676			614
	63	25	165	2117	12		4	6
	63	25	175	10714	123		32	63
	63	30	135	8392	294		1	266
	63	30	140	8148	298		2	247
	63	30	165	47640	5170		84	5000
	63	30	170	27420	2252		25	2184
	63	35	130	2681	27			2
	63	35	135	78717	2407		1	2049
	63	35	140	30117	722			706
	63	35	145	24963	621			573
	63	35	150	83211	3293		2	3229
	63	35	155	47503	2544		6	2489
	63	35	165	25500	3015		30	2917
	63	40	160	3080	46			44
	64	00	165	81910	1476		675	
	64	00	170	65435	1214		633	
	64	00	175	3000	41		20	
	64	05	150	10765	66		14	
	64	05	155	2925	5			
	64	05	160	2340	3		1	
	64	05	165	8775	91		11	
	64	05	170	8625	143		75	
	64	10	090	45450	878		1	

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상어 Sharks	기타새치 OTB	기타 Others
28		4	10					
10		1						
12		1	3	1				
8						1		
1			3			1		5
2	3		11	1		1		21
			28	2	3	2	3	24
1			1					
2			7					19
					3	5		19
			1	1		12		35
9		7	2	6	8	3		51
3		3	4	6		4		23
1						4		20
4	6	4	1	2	5	57	3	275
		3	1	1		2		9
2		1	1	2		8		34
15			3	8		4	13	19
16		1	15	1		4	1	11
12		1	2	5	6	1		41
1				1				
708	44	6	14	2	3	1	2	21
524	1	4	7	5		2	5	33
17			1					3
46	5		1					
5								
2								
75	4	1						
58			2	1	1			6
			16	15	826		17	3

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
5	61	00	145	13452	184		87	
	61	00	150	89330	998		727	
	61	00	155	26643	403		283	
	61	00	160	87430	1307		934	3
	61	00	165	145166	2920		2013	129
	61	00	170	27319	498		319	
	61	00	175	51308	1003		793	
	61	05	145	6400	52		38	
	61	05	150	3200	26		16	
	61	05	160	3200	51		42	
	62	00	160	23517	349		224	14
	62	00	165	112740	3750		3330	9
	62	00	170	43503	1488		861	2
	62	00	175	57130	1788		1187	137
	62	05	160	55895	1087		455	318
	62	05	165	23872	442		184	152
	62	05	170	19310	401		159	158
	62	05	175	17640	307		143	37
	62	10	160	64816	1681		993	416
	62	10	165	5692	147		60	66
	62	10	170	2970	17		3	13
	62	10	175	1925	77		21	49
	62	25	155	2600	110		2	99
	62	25	160	2600	70		2	55
	62	30	150	2366	120		1	109
	62	30	155	147029	6052		87	5347
	62	30	160	38088	1189		17	1056
	62	35	155	29045	1023		17	857
	62	35	170	41160	5501		4	5456
	63	00	140	5260	24		10	

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	흑새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
90				7				
250		6	12		3			
105		3	6	3			3	
325	7	3	29	3			3	
646	43	7	36	8	7	1	22	8
59			2	3		1		114
191		2	12	2			1	2
14								
9			1					
9								
68	3	1	7	4		1	6	21
315		9	37	4	18	1	9	18
134			8	2		1	4	476
395		3	32	3	2	3		26
215		4	28	10	12		38	7
87			8	3	4		3	1
69			11	1	1		2	
106			15		2			4
181		1	13	10	2	9	33	23
11			1	4	1	3		1
1								
7								
			1			1		7
10						2		1
4			3					3
419		4	51	2		8	1	133
47			10			6		53
106		4	6	1		9		23
7		3	2	4		2		23
13				1				

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quan.	위도 Lat.	경도 Long.					
5	63	00	145	9620	91		16	
	63	00	150	8380	66		28	1
	63	00	160	11970	178		120	
	63	00	165	30535	799		652	
	63	00	170	32110	625		189	106
	63	00	175	5200	167		75	27
	63	05	145	24553	635		163	239
	63	05	165	72760	2199		1921	8
	63	05	170	65715	1457		792	332
	63	05	175	111651	2471		1020	1130
	63	10	160	6410	142		73	16
	63	10	170	40014	871		230	499
	63	10	175	44871	911		248	518
	63	15	175	5533	83		11	64
	63	25	130	4656	207		5	181
	63	25	135	50736	1927		304	1523
	63	25	140	5436	186			179
	63	25	145	16382	309		34	239
	63	25	155	35870	795		91	461
	63	25	160	4740	99		4	76
	63	30	130	28484	900		42	771
	63	30	135	45188	1557		53	1348
	63	30	140	79578	2290		127	1961
	63	30	145	71060	2786		31	2675
	63	30	150	28626	630		21	562
	63	30	160	4634	17		3	12
	63	30	165	10095	489		10	457
	63	30	170	5475	65			58
	63	35	145	37200	1341		55	1275
	63	35	150	121525	5635		16	5471
	63	35	155	64301	1791		80	1866
	63	35	160	7056	227			224

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
64	3		4	2			1	1
34			2	1				
34		9			4	1		10
105		7	1			2		32
170	4	8	10	3	6	3		126
52			1		2	2		8
173			11	6	16	2	7	18
125		18	2		6	2		117
170		17	23	2	3	2	2	114
248	1	4	19	2	3	2	5	37
38			1	2		1	6	5
107	3	1	6	2		2		21
118			10	9		1		7
7		1						
1	6				4	2		8
31	4		19	3	1	7	7	28
			2					5
15			11	1		1	4	4
115	10	2	19	1		5	2	89
12				3			4	
11	11		2	2	3	10	3	45
25	6		4	5	5	19	12	80
12	4		30	6	5	31	18	96
20		1	17	1	4	8	3	26
27		2	1	3	1	3	6	4
						1		1
3		2		3		1	2	11
2				2			3	
			6	1		1	3	
6		11	9	8	1	20	14	79
5		1	7	6	3	3	10	10
1				2				

월 Month	해역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
5	63	35	165	4560	296		16	272
	64	00	145	5200	21		3	
	64	00	160	102372	1978		1314	
	64	00	165	235565	4778		2956	5
	64	00	170	107008	1903		1122	10
	64	00	175	71725	1754		1322	
	64	05	150	2340	12		4	
	64	10	085	17050	481			
	64	10	090	20000	774			
6	61	00	080	2772	18			
	61	00	150	3300	25		18	2
	61	00	155	38310	683		414	
	61	00	160	18250	180		140	
	61	00	165	47110	1045		940	2
	61	00	170	12450	459		432	
	61	00	175	40481	909		612	
	61	05	155	2970	28		18	
	61	05	175	2990	25		17	
	62	00	165	32170	384		283	12
	62	00	170	63079	1183		857	110
	62	00	175	178538	5202		3114	350
	62	05	170	47095	1096		398	301
	62	05	175	37528	1417		369	798
	62	10	175	24233	500		190	222
	62	20	175	2600	64		3	56
	62	25	155	44230	2189		25	1436
	62	25	160	21888	694		17	609
	62	25	165	17630	383		14	327

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
1				4				3
9	5					4		
592	16	10	16	3	5	4	5	13
1556	171	19	32	3	6	3	6	21
687	10	3	20	3	9	2	2	35
396		5	18	3		7	3	
6	2							
			3	18	373	5	80	2
			6	2	755		5	6
12			2	3		1		
5								
214	28	1	12	3	5		4	2
25		1	12	2				
90		2	6	2	1		2	
17	6		4					
270		12	8	3		4		
7		1	2					
7			1					
69	2	7	7	2			2	
185	20	1	6	4				
624		7	25	10	5	11	21	1035
348	7	5	7	3			3	24
242		2	2	2			2	
76		5	1	3			3	
2			2					1
656			13		1	14		44
18			10			24		16
18			2	1		13		8

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
6	62	25	170	25470	513		31	409
	62	25	175	2600	50		1	39
	62	30	155	38685	1408		13	1219
	62	30	160	9250	246		9	220
	62	30	165	51853	1888		47	1619
	62	30	170	2280	87		1	78
	62	35	160	2100	93		3	85
	62	35	170	23760	1518		6	1463
	63	00	080	2988	22			
	63	00	090	16171	153		15	
	63	00	095	2470	19		4	
	63	00	160	7380	61		45	1
	63	00	165	17810	273		148	50
	63	00	170	96478	1656		934	217
	63	00	175	56921	976		486	128
	63	05	165	61500	1621		1166	191
	63	05	170	53790	1059		178	617
	63	05	175	16777	276		31	150
	63	10	145	10300	373		88	120
	63	10	165	10600	116		16	87
	63	10	170	16570	257		38	165
	63	10	175	6600	76		7	64
	63	20	175	2600	60		4	51
	63	25	125	3040	31		10	12
	63	25	130	158166	5226		377	4144
	63	25	135	98048	2323	50	210	1854
	63	25	140	35410	1150		454	571
	63	25	145	91613	2142		424	1451
	63	25	150	40215	935		117	623
	63	25	155	5910	88		16	51
	63	25	165	13950	287		17	235

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
32			17	2	2	13		7
8								2
101			22			23		30
11			1			4		1
143		1	13	3		28	4	30
7			1					
2						3		
12			2	4		6		25
18				1		3		
114		1	1	3	1	8	3	7
13			1	1				
12			1	2				
62		2	9					2
409	15		31	2	2	3	4	39
283	6	1	6	3	5	2	8	48
173		18	1		2	4		66
237	1	3	3	5	2	1	9	3
81			7	3			4	
114		1	1	3		15	3	28
5		1				1		6
43		2	1	1		2		5
4		1						
1			3					1
	2		3			2		2
65	90		48	31	56	119	78	218
41	23	1	27	15	11	15	30	46
37	1		23	2	18	12		32
66		4	76	12	31	31	26	21
74	4	4	25	7	9	14		58
8			3	4	4	1		1
21			1	2		1	2	8

월 Month	해 역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚 시 수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
6	63	25	170	42090	803		35	674
	63	30	135	20475	468		16	396
	63	30	140	8700	224		61	128
	63	30	145	39095	1069		50	972
	63	30	150	2600	48		2	42
	63	30	170	18081	403		6	371
	63	30	175	3825	52		1	44
	63	35	165	23580	1991		12	1940
	64	00	095	19880	188		9	
	64	00	100	14100	116			
	64	00	110	2600	27			
	64	00	115	8120	37		3	
	64	00	120	18140	94		3	
	64	00	125	11340	71		4	
	64	00	130	5600	22		6	
	64	00	160	82020	1867		1200	2
	64	00	165	136905	3240		2454	
	64	00	170	197759	4399		2732	17
	64	00	175	33268	642		219	
	64	05	130	9828	105		8	
	64	05	135	5040	41		1	
	64	05	175	5200	82		58	
	64	10	085	6000	215			
	64	10	090	46075	1961			
7	61	00	160	9840	104		54	
	61	00	165	160450	3063		2065	
	61	00	170	17095	349		270	
		00	175	88967	1330		898	
	61	05	170	2400	27		15	

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
54				7		5	21	7
27		2		7	7	2	11	
10			1	4	7	2	11	
24		1	3	3		6	4	6
		3						1
17				3		4	2	
5				1		1		
3		4	1	4	4	4	4	15
141		3	1	5		5	19	5
94				2		5	8	7
18		1	3			3		2
25	5	1	3					
70	9	1	10			1		
54	4	5	3			1		
6	5		2					3
574	53	8	13	4	1	2	8	2
703	27	17	22	4	3	2	8	
1460	70	1	19	4	3	3	7	83
363	17	2	5	2		1		33
92	3		1					1
30	8		2					
21			3					
				2	202		7	4
			4	4	1920		12	21
22		1	5		5			17
667	12	8	58	6	18	3	2	224
70			6	3				
297	7	1	69	3		52		3
9			2		1			

월 Month	해 역 Area 상한 Quad.	위도 Lat.	경도 Long.	낚시수 No.of hooks	계 Total	참다랑어 BFT	황다랑어 YFT	날개다랑어 ALB
7	62	00	160	11925	194		130	
	62	00	165	31200	875		754	
	62	00	170	104845	3084		2713	
	62	00	175	11180	399		344	
	62	05	165	6720	118		95	
	62	05	170	43350	1282		506	12
	62	05	175	7700	158		56	67
	62	10	175	3850	95		63	20
	62	15	170	5640	116		31	51
	62	15	175	4063	86		44	30
	62	20	155	20800	399		38	303
	62	20	160	33800	866		41	752
	62	20	170	16940	436		45	327
	62	20	175	45932	875		131	611
	62	25	160	13000	1012		22	942
	62	25	170	9735	266		31	183
	62	25	175	42180	1006		29	902
	62	35	150	27960	2485		32	2381
	63	00	115	3020	34			
	63	00	150	2915	21		16	
	63	00	155	14156	154		87	25
	63	00	160	9150	239		117	27
	63	00	165	35910	1326		1015	83
	63	00	170	20080	549		350	62
	63	00	175	20730	624		349	96
	63	05	145	51000	1693		475	520
	63	05	150	16026	494		146	163
	63	05	155	19866	488		175	170
	63	05	160	22370	883		298	320
	63	05	165	15280	378		89	187

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	흑새치 BUM	청새치 STM	돛새치 SAI	상어 Sharks	기타새치 LTB	기타 Others
54		4		1				5
62		2	3	3				51
359		1	3	6			2	
52		1		2				
20								3
675		17	2		20	7		43
32		1		2				
11				1				
13				2	17	1		1
8			3					1
30			8			20		
40				16		17		
13			13	2	4	32		
34			26	3		65		5
40				4		3	1	
8			7	1	1	35		
35		7	24	5	1	1	1	1
21		6	2	2	4	5		32
27				7				
3			2					
33		1	4	1		3		
94								1
207		6	8	2		2	2	1
126	1	1	1	4	2	1		1
175			2	1	1			
524	27	3	3	6	15	95	4	21
129	3	5	6		1	31		10
136		1	2	3		1		
236				8	12	3	5	1
85	4				1	7		5

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
7	63	05	170	172946	4470		1239	1869
	63	05	175	119353	2771		620	1446
	63	10	130	2535	60	12	17	27
	63	10	145	2550	92		20	45
	63	10	150	38635	1360	11	546	415
	63	10	170	9933	174		40	118
	63	10	175	10325	147		17	92
	63	15	140	5600	277	12	37	210
	63	15	170	4498	121		29	67
	63	15	175	18164	357		98	222
	63	20	145	5400	150		50	88
	63	20	165	9785	194		12	169
	63	20	170	22437	377		22	327
	63	20	175	7444	147		17	93
	63	25	125	15850	462		28	397
	63	25	130	139843	4889		202	4305
	63	25	135	199877	7297		532	6364
	63	25	140	5640	109		32	70
	63	25	145	2700	57		19	32
	63	25	165	55345	1538		97	1269
	63	25	170	18002	302		20	250
	63	25	175	2150	36		1	32
	63	30	130	9760	641		4	608
	63	30	165	6720	317		9	269
	63	30	170	23288	1048		23	853
	63	35	135	2820	136		7	125
	64	00	100	75562	605		19	
	64	00	105	25492	119		9	
	64	00	110	19650	155		5	
	64	00	115	16600	96			
	64	00	120	5720	50		7	

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
1183	21	14	39	15	32	13	5	40
653		2	16	9		2	6	17
1			2	1				
20	2			1		2		2
351			7	10		15	4	1
11		3	1	1				
31		2	3					2
4			3		5			6
9			6					10
20			11					6
2		2	6			2		
10				3				
10	2		2	9	1	1	3	
19			12	3				3
1	2	4	10	1		10		9
38	49	8	42	55	11	125	11	43
90	21	2	46	66	2	114	18	42
5			1			1		
2			3			1		
66		6	33	20	14	21	7	5
20			5	1	1	5		
			1			2		
2	3			1	1	19		3
30					2	7		
139		3	2	2	2	24		
4								
439	29	19	33	41			15	10
76	3	2	13	9			6	1
96	2	2	6	20			10	14
67	3	4	10	8	1		2	1
36			3	4				

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
7	64	00	125	2990	16		6	
	64	00	150	13390	241		148	
	64	00	155	34039	879		497	
	64	00	160	210619	4814		2666	15
	64	00	165	110731	2292		1257	2
	64	00	170	14900	210		116	
	64	00	175	50934	941		666	1
	64	05	100	36460	337		44	
	64	05	105	2600	7			
	64	05	150	13500	239		124	
	64	05	160	5395	163		82	
	64	10	085	35300	1673			
	64	10	090	16250	210			
8	61	00	155	13725	242		88	
	61	00	160	22365	375		142	
	61	00	165	9165	132		41	
	61	00	170	26845	616		493	
	61	00	175	46540	926		786	
	61	05	155	21320	609		536	
	62	00	160	25365	784		602	
	62	00	165	27412	545		422	
	62	00	170	41025	1401		1014	7
	62	00	175	118495	3180		2166	92
	62	05	160	4380	23		13	1
	62	05	165	10980	138		78	
	62	05	170	41050	1225		691	76
	62	05	175	9460	418		161	77
	62	15	155	2600	138		25	108
	62	20	150	13000	394		209	170
	62	20	155	59800	2435		80	2177

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others.
9		1						
78	8	2		2	3			
359	8	2	9	1		3		
1899	22	6	19	30	7	11	6	133
881	3	3	17	8	4	9	2	106
93			1					
250		3	12	4	1	2		2
258	1	4	16	10			4	
5			2					
104			8	2		1		
78				3				
			3	38	1614		8	10
			7	9	188		5	1
88			2		1	2		61
180		4	1		2	2		44
39	3	1	1		1	1		45
120			2			1		
116		5	17	1		1		
56		1	2		2			12
142		6		2	2	2		28
107			1	2	6	2	1	4
316		1	4		2	24		33
759		7	20	3		65	3	65
2		4						3
31		2	1		4	3		19
376		11	2		8	17		44
175		1	3			1		
						3		2
2			1	2		5		5
98			14	2		28	7	29

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
8	62	20	170	5070	59		7	44
	63	00	115	5810	68			
	63	00	120	6270	35		4	
	63	00	150	16875	323		154	
	63	00	155	23985	1052		322	20
	63	00	160	42344	1278		522	8
	63	00	165	28320	735		497	10
	63	00	170	26464	660		399	
	63	00	175	233405	7676		5889	259
	63	05	145	5100	92		20	22
	63	05	150	22935	870		220	122
	63	05	155	25500	1081		356	289
	63	05	160	68632	2053		829	683
	63	05	165	75716	2131		787	550
	63	05	170	73921	2360		678	1034
	63	05	175	89244	2205		588	948
	63	10	085	2529	30		13	9
	63	10	090	30363	162		17	4
	63	10	145	27040	906		184	301
	63	10	150	41367	1436	10	593	428
	63	10	165	28720	670		109	361
	63	10	170	59461	1154		320	678
	63	15	085	10840	95		43	18
	63	15	090	16030	365		14	302
	63	15	165	5200	51		3	33
	63	15	170	26300	473		81	326
	63	20	080	5460	61		8	
	63	20	085	2400	23		10	4
	63	20	160	16232	338		33	238
	63	20	165	19880	442		20	311
	63	20	170	36689	636		31	546
	63	20	175	17745	315		205	70

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
						8		
53			1	3			8	3
19	3			2			6	1
163		1		2		3		
551	19	6	6			1		127
619	1	2	4	3	1	3	7	108
224		1	1	1		1		
258		2	1					
1422	23	6	20	3	1	16	18	19
33	2	1	1		2	5		6
162	10	1	3	3	9	168		172
207	31	6	8	3	5	81		95
477	3		31	1	12	8		9
723	5	1	20	5	20	6		14
583	1	9	20	7	13	5		10
620	2	7	24	3		3	8	2
7				1				
125	3	2	7	3				1
399			1	3		3	10	5
355			9	6		7	18	10
164			17	11	1	2		5
61		1	11	3		3	2	75
24	1	1						8
19	9	4	4					13
4			9					2
44		1	9	2		2	2	6
38	9	3						3
3	5	1						
16		6	17	6	8	3	6	5
40	1		14	3	14	12	9	18
32		3	13	2		2	5	2
8			15			9		8

월 Month	해역 Area			낚 시 수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
8	63	25	130	78080	2749		97	2529
	63	25	135	167146	5251		183	4766
	63	25	140	7510	224		13	171
	63	25	145	2440	68		9	50
	63	25	150	17230	592		15	505
	63	25	155	38670	1088		72	851
	63	25	160	13593	231		20	160
	63	25	165	9320	263		14	203
	63	25	170	16494	347		14	279
	63	30	165	10080	324		3	283
	63	30	170	80785	3361		70	2772
	64	00	130	6193	21		2	
	64	00	135	9102	42		17	
	64	00	140	16805	54		11	
	64	00	145	3375	6		4	
	64	00	150	13510	179		113	
	64	00	155	10140	191		114	
	64	00	160	73867	986		576	
	64	00	165	103693	1577		998	
	64	00	170	66693	1433		972	
	64	00	175	30610	365		231	
	64	05	135	30688	266		58	
	64	05	140	15948	112		20	
	64	05	150	33060	351		169	
	64	05	155	5370	24		5	
	64	05	170	2750	8		7	
	64	05	175	3276	45		26	
	64	10	090	7250	134			
9	61	00	160	10980	218		138	
	61	00	165	13440	166		89	
	61	00	170	5430	31		16	
	61	00	175	4790	132		114	

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
7	19	6	31	1		25		34
122	14	3	10	11	5	22	51	64
2	8		2	4	1	10		13
1				2		2		4
7	5	2		2	2	20	5	29
32		13	15	5	9	32	21	38
10				3		10	6	22
34	1		1	3	3	2		2
22		1	7	3	1	6		14
33						2		3
410			14	1		5	4	85
3		1	1	4			7	3
20			2	3				
42			1					
1			1					
47	15	1	2	1				
71	3		2	1				
365		3	12	1	2	5	5	17
504	3	5	15	2	2	2	4	42
410	8	7	13	2	3	1	7	10
111		2	11	3			7	
181		1	12	3			10	1
86		3	2	1				
167		2	9	2	1	1		
18			1					
1								
11			8					
			3	5	108		18	
54		4				2		20
52	1	3	5		5	3		8
12			1					2
14			4					

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
9	61	05	175	3507	7		2	
	62	00	155	6540	89		58	
	62	00	170	80222	1639		982	92
	62	00	175	86023	2404		1731	74
	62	05	165	4852	146		89	12
	62	05	170	27032	581		189	205
	62	05	175	34220	862		373	225
	62	10	155	27885	754		146	536
	62	10	170	4400	83		2	67
	62	15	150	2600	51		11	40
	62	15	155	41145	1037		146	811
	62	15	160	12675	254		22	201
	62	15	170	2600	38		8	27
	62	20	170	33335	850		84	725
	62	20	175	15400	316		9	278
	63	00	095	7464	42			
	63	00	110	4400	30		10	
	63	00	135	2834	43		2	
	63	00	150	77219	1613		885	11
	63	00	155	95991	3462		1703	150
	63	00	160	238301	8512		4534	449
	63	00	165	220487	6985		4626	344
	63	00	170	62841	1291		994	6
	63	00	175	113201	2370		1589	157
	63	05	105	41540	512		204	6
	63	05	110	12690	80		13	
	63	05	115	2500	20		8	
	63	05	145	60646	1722		493	550
	63	05	150	175204	4853		1532	1437
	63	05	155	78940	2629		775	380
	63	05	160	63073	1781		799	502

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
4			1					
16	1	1			2	2		9
524		6	9	2			2	22
496		8	26	2	5	62		
43			2					
172	2		11		1	1		
222		3	4	1	1	30	3	
38			12			22		
13			1					
35			15			30		
8			12			11		
2			1					
18			2			21		
13		2	10			4		
37		1	2	2				
16			1	2			1	
38			1	2				
610	37	9	22	2		2	5	30
1331	56	6	26	3	1	5	8	173
3188	47	29	55	3	1	11	13	182
1886	13	19	50	3		9	13	22
267		4	8		1	1		10
586		10	15	1		1	8	3
213	26	2	30	4			18	9
53	4	1	7	2				
9				3				
532	9	8	14	2	5	76	13	20
1554	78	14	58	4	22	84	27	43
843	58	5	19	6	19	8	12	4
434	6	1	21	3	3	9	2	1

월 Month	해역 Area 상한 Quad,	위도 Lat.	경도 Long.	낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
9	63	05	165	80093	2290		816	649
	63	05	170	45944	1171		583	312
	63	05	175	94870	2814		1333	541
	63	10	085	2520	15		5	
	63	10	090	5320	21			6
	63	10	095	2660	7			
	63	10	110	2184	27		4	4
	63	10	115	2191	20		4	10
	63	10	125	2184	27		1	13
	63	10	130	19019	493		51	343
	63	10	135	2717	83		14	46
	63	10	150	55109	1401	16	126	657
	63	10	155	4300	85		6	42
	63	10	160	2340	45		9	25
	63	10	170	18544	265		91	128
	63	10	175	3960	92		25	21
	63	15	085	2660	22		7	2
	63	20	160	9200	164		7	104
	63	20	165	2100	27		2	12
	63	20	170	2200	60		4	10
	63	25	130	33570	951		128	792
	63	25	135	26303	534		12	490
	63	25	160	2400	67		8	44
	63	30	170	14400	354		2	267
	64	00	160	63555	1869		1079	5
	64	00	165	22253	231		92	1
	64	00	170	29857	728		426	
	64	00	175	18747	103		83	
	64	10	085	14540	585			
	64	10	090	4400	94			

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
766			26		8	17		8
255		2	8	3		1		7
851		4	16	3		41	11	14
5	3		1					1
11	2		1	1				
7								
12				6		1		
		2		4				
4				5			4	
70	3		1	1	5	6	4	9
22						1		
552	3		6	3		7	18	13
8			10	6	3	3	7	
7	3		1					
40			4	1		1		
30				2		14		
9		2						2
10		6	6	4	9	6	12	
3			4	3	3			
33		3	4	1	5			
3	3		4			21		
3	8	1	1	1	4	10		4
5		1	1	1	3	4		
74			6					5
671	12	1	6	2	2	5	9	77
127		1	7	3				
293			6			3		
17		1	2					
			4	4	559	1	17	
				1	93			

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
10	61	00	165	11700	321		265	
	61	00	170	6142	51		39	
	61	00	175	9606	83		29	
	62	00	165	25412	483		361	
	62	00	170	19450	200		130	
	62	00	175	23870	577		441	6
	62	05	160	21926	722		539	69
	62	05	165	35531	951		724	40
	62	05	170	73736	2931		2276	219
	62	10	155	94757	3323		1664	1354
	62	10	160	2085	33			29
	62	10	170	2200	28		4	14
	62	15	165	4400	77		15	53
	62	15	170	2200	30		2	19
	62	15	175	8800	132		58	44
	62	20	175	8800	332		89	218
	63	00	135	5276	110		45	14
	63	00	140	14400	119		58	1
	63	00	145	41020	384		166	1
	63	00	150	109327	2469		1132	85
	63	00	155	135631	2845		1412	280
	63	00	160	166564	5405		3119	492
	63	00	165	129326	3247		2245	150
	63	00	170	138061	3262		2189	64
	63	00	175	213307	3844		2486	50
	63	05	140	10830	243		48	44
	63	05	145	55701	1083		311	273
	63	05	150	239691	5301		1713	1219
	63	05	155	154859	4537		1843	1071
	63	05	160	95879	2735		1043	626
	63	05	165	31626	510		217	96

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돗 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
47	2	2		5				
9			3					
45	1	3	3	2				
100		1	7	9	1		4	
64		2	3				1	
120		1	3	5			1	
103			7				4	
173		3	2	5	1		2	1
394	10	3	12	10	3		4	
185			42			63	15	
2			2					
3			3	4				
3			3			3		
7						2		
19		1	2	7		1		
20			2			2	1	
43	1	2	2					3
48	4	2	5				1	
175	15	1	18	5			2	1
1143	2	11	23	39		10	3	21
961	103	5	28	29	2	6	3	16
1528	40	28	17	57	37	4	3	80
759	1	6	38	28	7	3	3	7
893	4	21	19	18	1	48	3	2
1166	6	9	31	47	1	41	4	3
129	8		6	6		1	1	
422	11	6	16	40		1	3	
2111	21	26	69	62	5	43	3	29
1268	186	11	48	43	20	12	13	22
790	178	3	26	24	10	15	5	15
172	1			11	8	5		

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
10	63	05	170	39698	744		433	132
	63	05	175	71155	1326		560	281
	63	10	140	38300	1031		202	374
	63	10	145	21885	430		46	186
	63	10	150	2775	34		8	15
	63	10	155	5224	144		77	52
	63	10	170	5840	117		35	51
	63	15	175	6600	104		15	47
	63	20	170	2200	45		25	11
	63	20	175	13200	241		131	86
	63	25	150	2775	48		7	19
	64	00	160	15570	326	9	161	
	64	00	165	55648	1071	2	605	4
	64	00	170	18530	311	11	188	
	64	00	175	63700	1242		415	
	64	05	165	7620	75	2	39	
	64	05	170	14335	174			
	64	10	085	15400	385		2	
	64	10	090	55810	1616			
11	61	00	155	3300	73		55	
	61	00	160	5420	104		94	
	61	00	165	12780	259		174	
	61	00	170	2880	53		9	
	61	00	175	28790	387		266	
	61	05	160	2700	5			
	61	05	170	2650	14		3	
	61	05	175	10570	120		55	
	61	10	090	2500	92			

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
137		4	10	24	1		2	1
452		1	8	12	1	8	3	
424	4		2	8	3	12		2
187			4		2	5		
10						1		
13			1			1		
23			3	5				
12		3	5	14		9	1	
7			1			1		
9		3	8			2	2	
22								
138			7	9		1	1	
417	3	3	22	10			5	
75			4	30		2	1	
759	4	4	21	32		2	5	
31		1		2				
			2	14	158			
			3	4	373	3		
			16	63	1533	1	3	
16			2					
7			3					
78			5		1		1	
42			1		1			
104			9	3			5	
5								
9			1	1				
54			7	1		1	2	
				1	91			

월 Month	해역 Area			낚시수 No.of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
11	62	00	155	46995	760		670	
	62	00	160	60390	1237		1037	3
	62	00	165	35204	596		444	
	62	00	170	2970	49		35	
	62	05	160	21828	645		525	36
	62	05	165	56444	1188		781	94
	62	05	170	28390	857		519	149
	62	10	155	1872	34		6	24
	62	10	160	29601	1467		706	624
	62	10	165	6644	220		110	67
	62	10	170	14064	464		272	100
	62	10	175	13850	456		264	140
	63	00	145	136835	2051		376	9
	63	00	150	157965	2122		663	26
	63	00	155	92691	1743		770	35
	63	00	160	61444	1339		687	47
	63	00	165	10644	113		69	9
	63	00	170	3850	76		12	9
	63	00	175	1,595	175		51	10
	63	05	145	58000	1808		572	498
	63	05	150	59800	1335		500	210
	63	05	155	10678	228		60	96
	63	05	160	16048	443		148	74
	63	05	165	30938	532		154	172
	63	05	170	142475	2681		1079	781
	63	05	175	47375	953		343	353
	63	10	130	15900	433		103	229
	63	10	135	29660	1055		111	664
	63	10	140	10780	381		38	147
	63	10	160	2775	22		5	
	63	10	165	3312	57		4	38
	63	10	170	5900	81		2	49
	63	10	175	7800	152		11	118

눈다랭이 BET	가다랭이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돗새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
64			18			1	7	
161		2	29	1			4	
138			10	2			2	
14								
76			6				2	
287			20	1	1		4	
172			9	3		3	2	
2			1			1		
69			29			36	3	
40			3					
79	3	2	4	3		1		
35	7		4	4	1	1		
1514	37	14	40	2	2	6	5	46
1332	8	17	51	10	3	5	6	1
881	3	7	25	14	1	5	2	
548		11	24	9	6	2	3	2
34		1						
28				2		25		
92		2	2	2		16		
707		8		19		4		
590		10	4	11		9	1	
63	3		1	2		1		2
169	39		8	2		1	2	
169	23	2	6	3		3		
764		4	21	18	2	6	5	1
215		1	8	1	1	26	5	
89		2		2		8		
267		1	4			5		3
192			3	1				
11	2			2	2			
15								
15		2		3		10		
13				2		8		

월 Month	해 역 Area 위도 Lat.	경도 Long.	낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
11	63	15	125	19120	738	33	560
	63	15	130	59870	1513	80	1266
	63	15	175	11000	242	4	223
	63	20	120	8165	203	9	154
	63	20	125	10500	389	4	314
	63	20	175	48400	1192	47	1032
	64	00	145	6372	40	16	
	64	00	150	64976	1260	756	
	64	00	155	9480	149	37	
	64	00	160	118320	2260	1025	
	64	00	165	153255	3578	1586	3
	64	00	170	95062	2230	960	2
	64	00	175	15680	244	121	
	64	05	160	18270	297	116	
	64	05	175	3100	37	29	
	64	10	160	71510	2728		
	64	10	165	3060	34	3	7
12	61	00	160	19469	520	438	9
	61	00	165	2900	21	9	3
	61	00	170	2990	60	22	
	61	00	175	10800	130	60	
	61	10	170	5600	160	122	23
	62	00	165	9750	305	255	4
	62	00	170	58890	2575	2207	25
	62	00	175	1870	88	48	36
	62	05	170	39400	1392	846	259
	62	05	175	35100	1455	725	525
	62	10	160	2300	183	50	105
	62	10	165	9200	315	139	143

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
125			3	2		13		2
100		4	23	3		28	5	4
4		1	8				2	
33			2	2		3		
57		1		2		11		
18		4	61			24	6	
18		2	2			2		
441		11	23	6	3	18	2	
106		1	3			2		
1190		2	26	6	1	3	5	2
1917		9	36	4	3	6	4	10
1169		3	15	3	1	2	5	70
106		2	5	2	3		1	4
169			8	2			2	
6								2
		2	2	9	2711	3	1	
19			3	2				
56			6			1	4	6
9								
37				1				
64		1	2				2	1
7		1		4	3			
43			3					
312		18	5	2		1	5	
4								
256			13		3		15	
190				14		1		
23			2			2		1
19			2			3	2	7

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
11	62	10	170	80150	2614		1847	441
	62	10	175	82802	2404		1318	735
	62	15	170	16600	624		497	88
	62	15	175	30887	788		414	326
	62	20	175	2346	46		5	33
	63	00	145	3375	20		7	
	63	00	150	15752	205		63	6
12	63	00	155	86329	1235		630	23
	63	00	160	161849	3023		1424	82
	63	00	165	149486	3150		1776	13
	63	00	170	28500	422		245	1
	63	00	175	5791	94		54	2
	63	05	145	32150	845		355	85
	63	05	150	57705	1570		627	177
	63	05	155	32400	609		370	46
	63	05	160	6650	85		40	8
	63	05	165	7835	87		41	10
	63	05	170	7215	108		37	38
	63	05	175	11464	374		140	170
	63	15	165	3186	32			28
	63	15	170	18476	307		16	255
	63	10	175	21582	432		98	256
	63	15	110	63578	2163		11	1969
	63	15	115	35110	1070		22	940
	63	15	120	34972	1119		40	924
	63	15	125	13394	250		40	174
	63	15	170	15120	258		23	210
	63	15	175	8800	184		42	116
	63	20	110	2700	66			58

눈다랑이 BET	가다랑이 SKJ	황 새 치 SWO	녹 새 치 BUM	청 새 치 STM	돛 새 치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
237	4	2	24	10	17	3	21	8
266	20	13	18	7	6	2	18	1
20			10				7	2
21			15				12	
4			2				2	
13								
122		3	5	1			5	
524	11	10	16	3			16	2
1363	38	32	32	7	4	1	33	7
1297		23	14	7		2	13	5
169		1	2	4				
35			3					
381	7		6	2			9	
727	6	7	10	3		1	12	
166			13	3		1	10	
23	5	1	5				3	
32		1	3					
29		3	1					
53			6			1	4	
3				1				
15		2	2	3		5	1	8
48		2	2	2		6	1	17
68	15	2	27	3	18	10	27	13
25	8	8	15			6	14	32
84	5	7	25	2	8	2	20	2
26			2			3	2	3
9			5	2		6	3	
24			2					
4			4					

월 Month	해역 Area			낚시수 No. of hooks	계 Total	참다랑이 BFT	황다랑이 YFT	날개다랑이 ALB
	상한 Quad.	위도 Lat.	경도 Long.					
12	63	20	115	65195	1989		98	1673
	63	20	120	181697	5493		296	4417
	63	20	125	5400	219		10	182
	63	20	160	8004	22		6	
	63	20	170	6600	109		16	78
	63	20	175	8800	179		7	140
	64	00	105	2868	13		8	
	64	00	155	17745	169		70	
	64	00	160	39845	772		398	
	64	00	165	114967	1921		1082	3
	64	00	170	262929	5020		2085	3
	64	00	175	32600	682		449	
	64	05	075	4825	64			
	64	05	080	34615	1460		23	
	64	05	155	5720	51		19	
	64	05	160	14950	287		139	
	64	05	165	2795	21		6	
	64	05	175	2990	52		8	
	64	10	090	22770	655		1	

눈다랑이 BET	가다랑이 SKJ	황새치 SWO	녹새치 BUM	청새치 STM	돛새치 SAI	상 어 Sharks	기타새치 OTB	기 타 Others
131	1	8	13	4		11	12	38
439	3	29	38	12	15	48	37	159
15		2	3			3	2	2
14			2					
3		1	7			1	3	
4		4	13			1	10	
4				1				
93		1	3			1	1	
335	18	1	5	3	1	3	2	6
765		4	9	4		3	8	43
2762		7	30	5	2	4	26	96
223		1	5	2			2	
				2	61	1		
		4	3	6	1421	1	2	
29		1	1	1				
139		1	5	2			1	
15								
43		1						
			3	13	637		1	

Ⅴ. 大洋別 魚種別 漁場 分布圖

Geographical distribution of hook rate and fishing effort by species and by sub-area

大　西　洋
Atlantic Ocean

1. 全魚種의 分期別 月別 釣獲率 및 努力量 分布図

Distribution of hook rate and fishing effort of all species by month and by quarter

2. 魚種別 分期別 月別 釣獲率 및 努力量 分布図
날개다랑이, 황다랑이, 눈다랑이

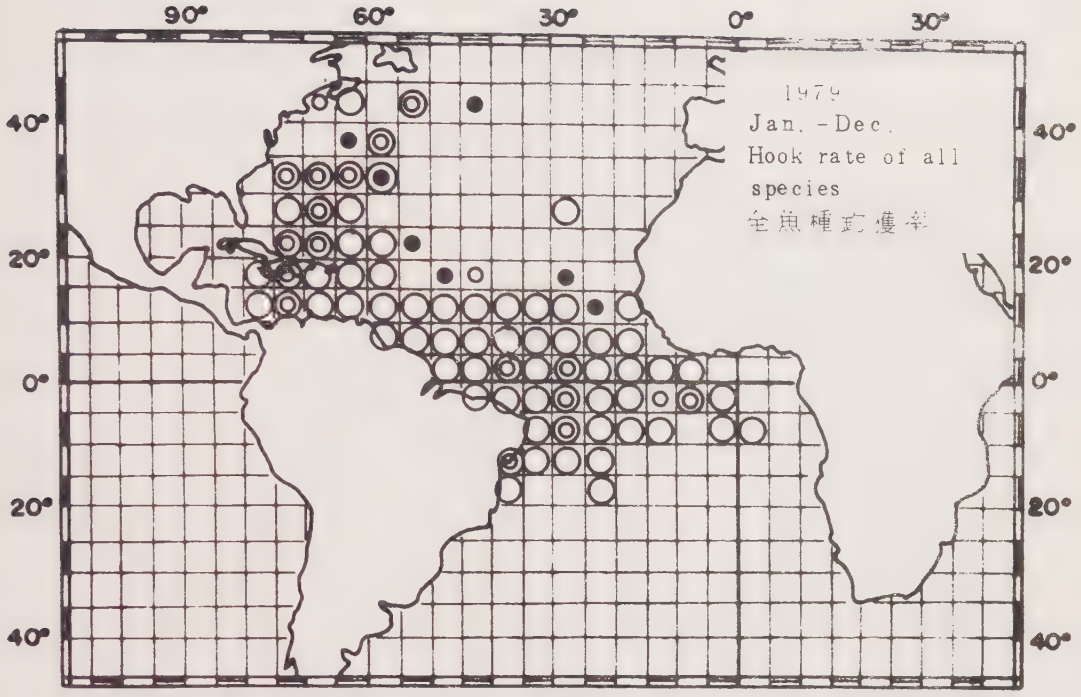
Distribution of hook rate and fishing effort by species by month and by quarter
Albacore, Yellowfin, Bigeye

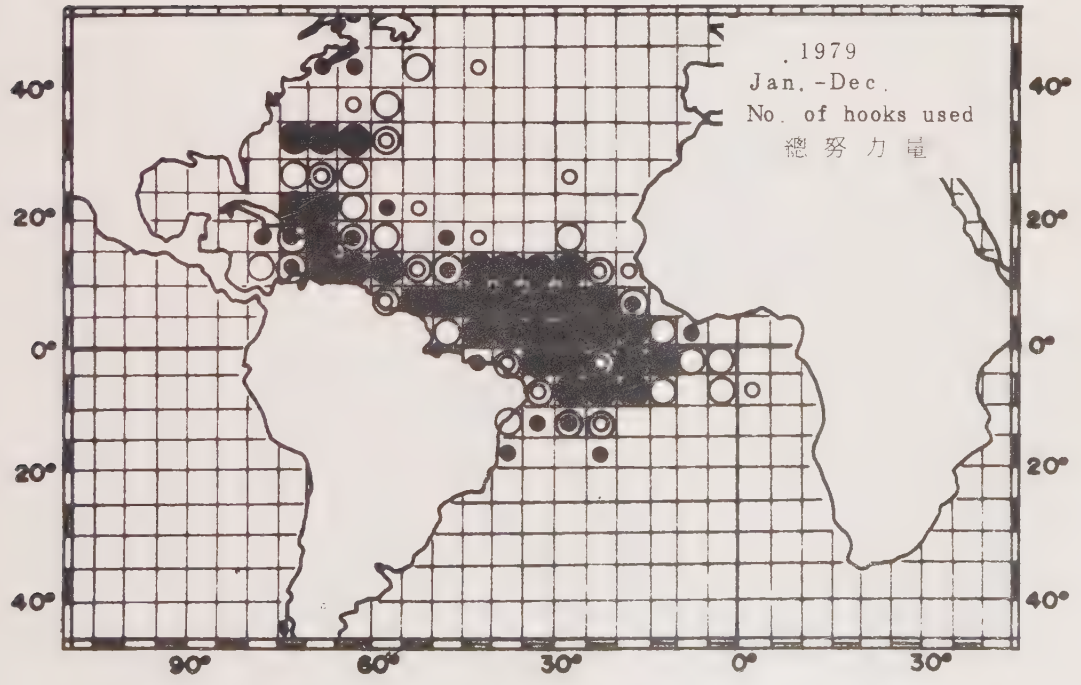
全　　魚　　種

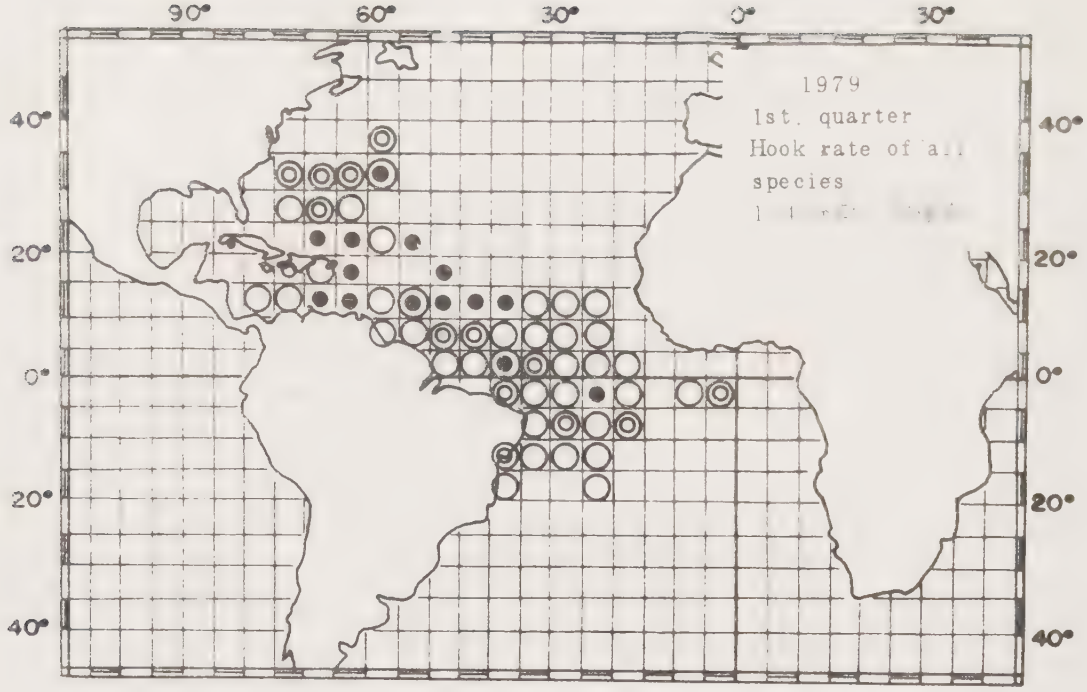
分期別 月別 釣獲率 및 漁獲努力 分布圖

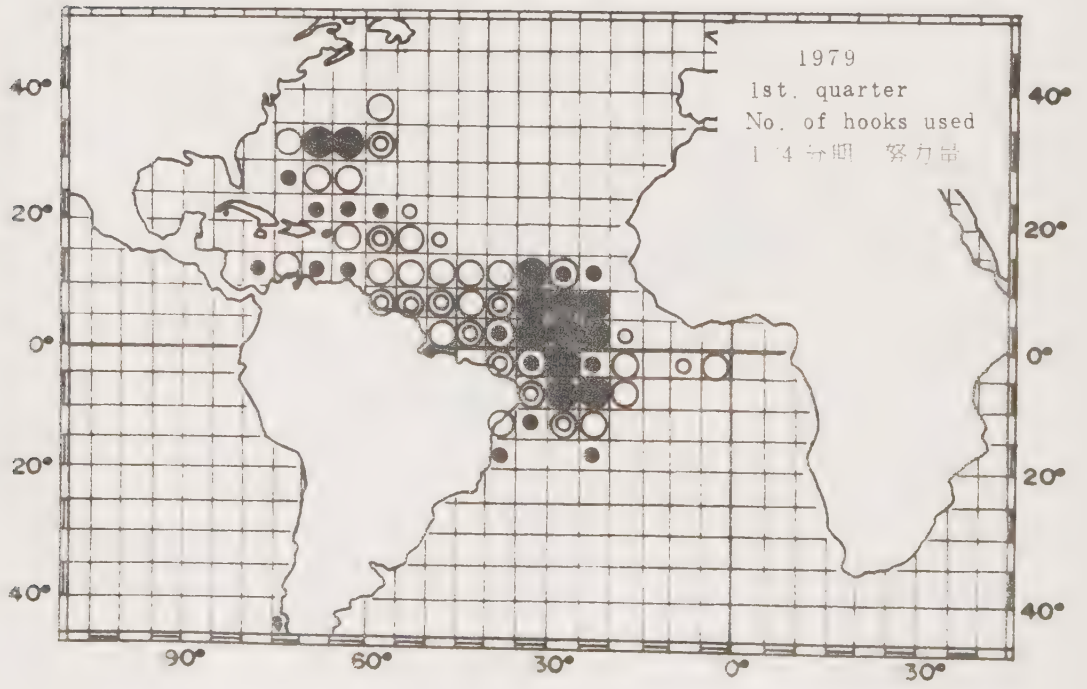
All species

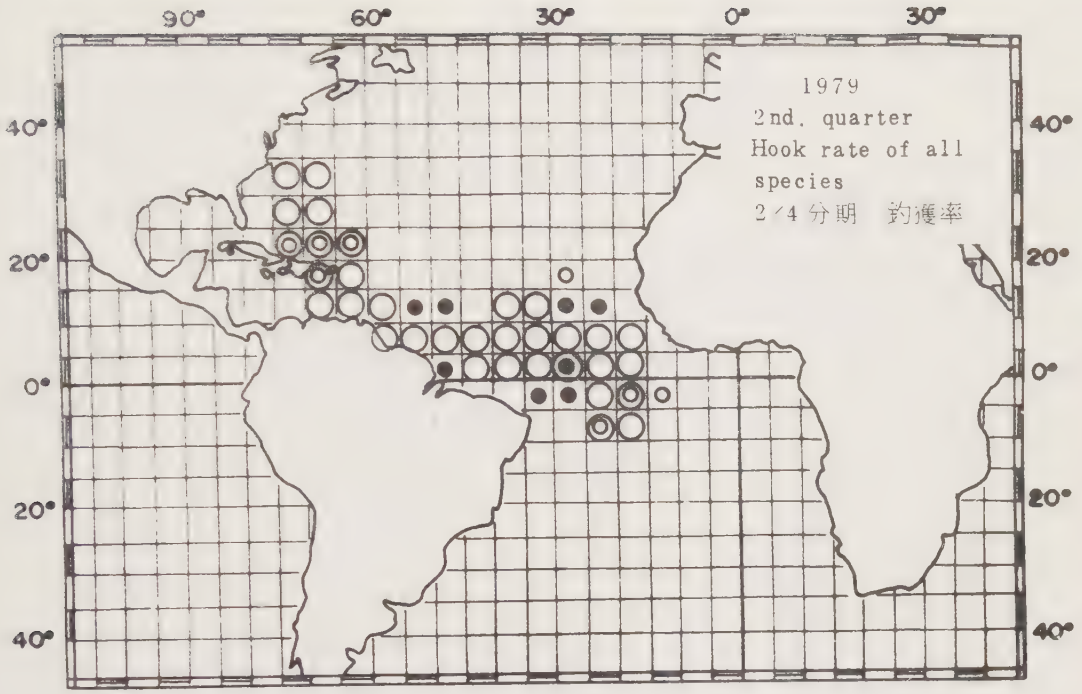
Hook rate and fishing effort by month and by quarter

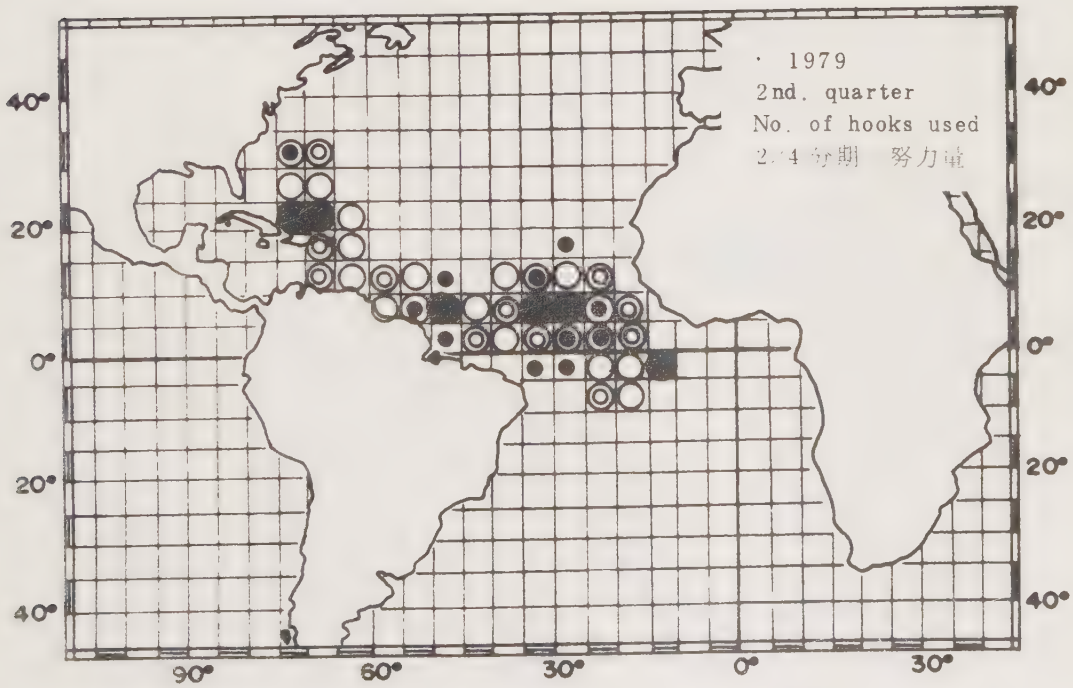

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
Jan.-Dec.
Hook rate of all species
全魚種釣獲率

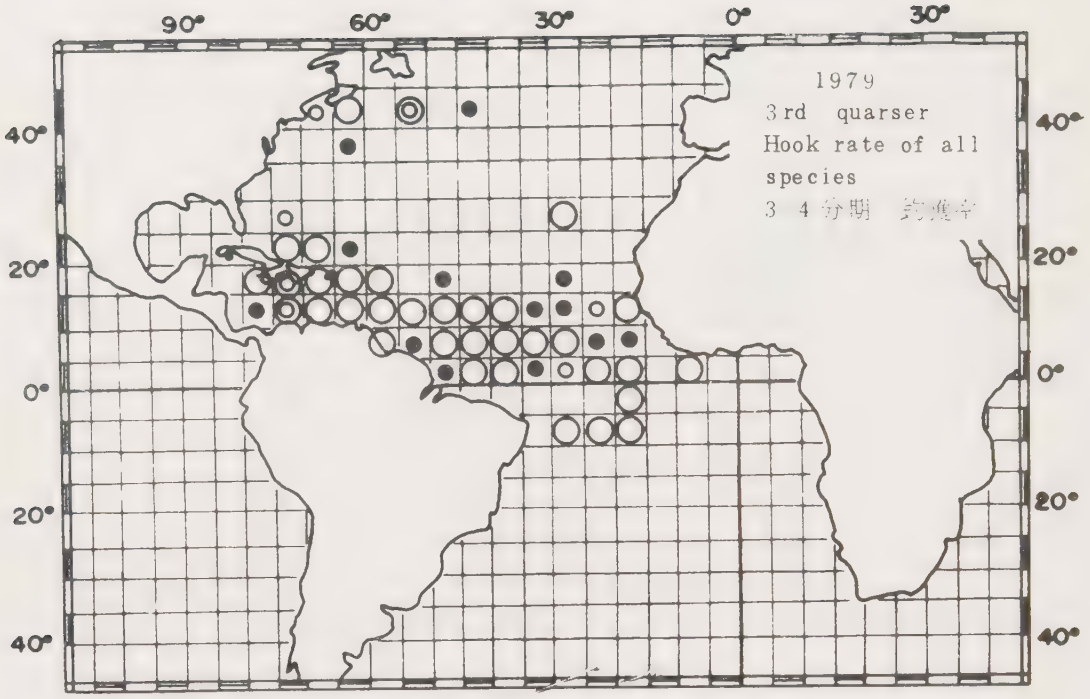

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
Jan.-Dec.
No. of hooks used
總 努 力 量

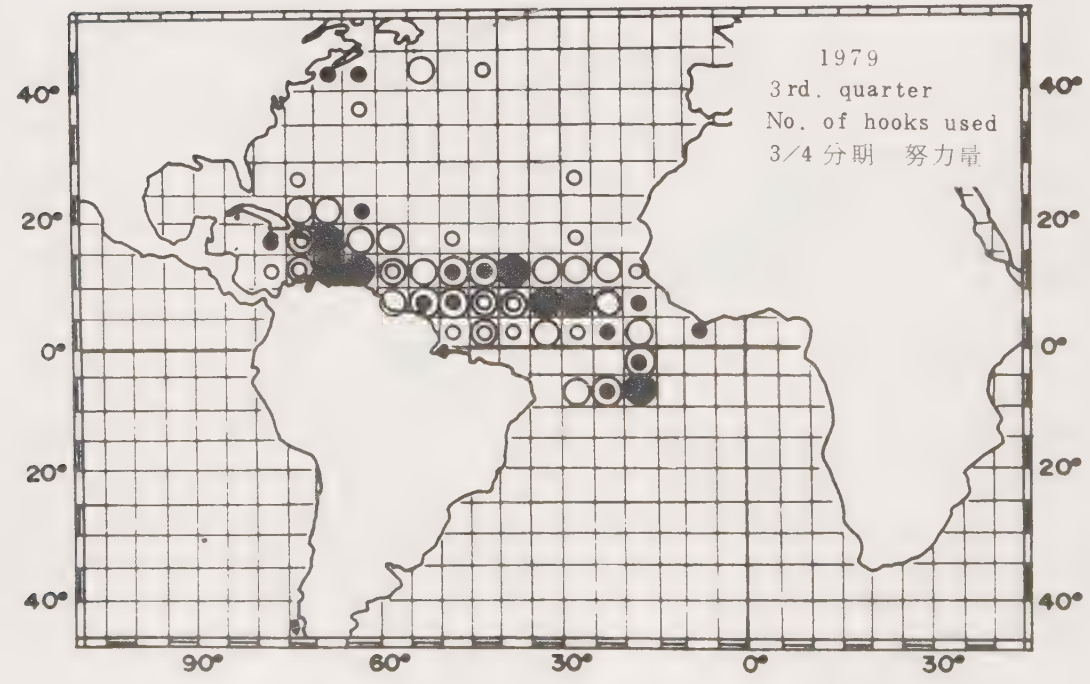

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
1st. quarter
Hook rate of all
species

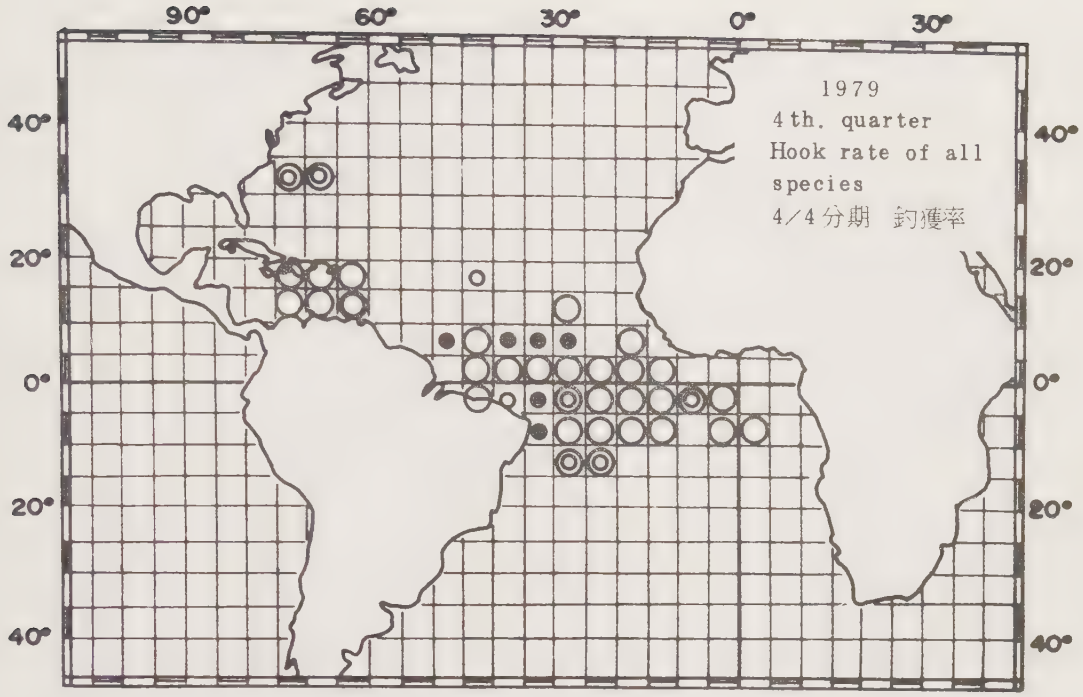

40°
20°
0°
20°
40°
1979
1st. quarter
No. of hooks used
90°
60°
30°
0°
30°

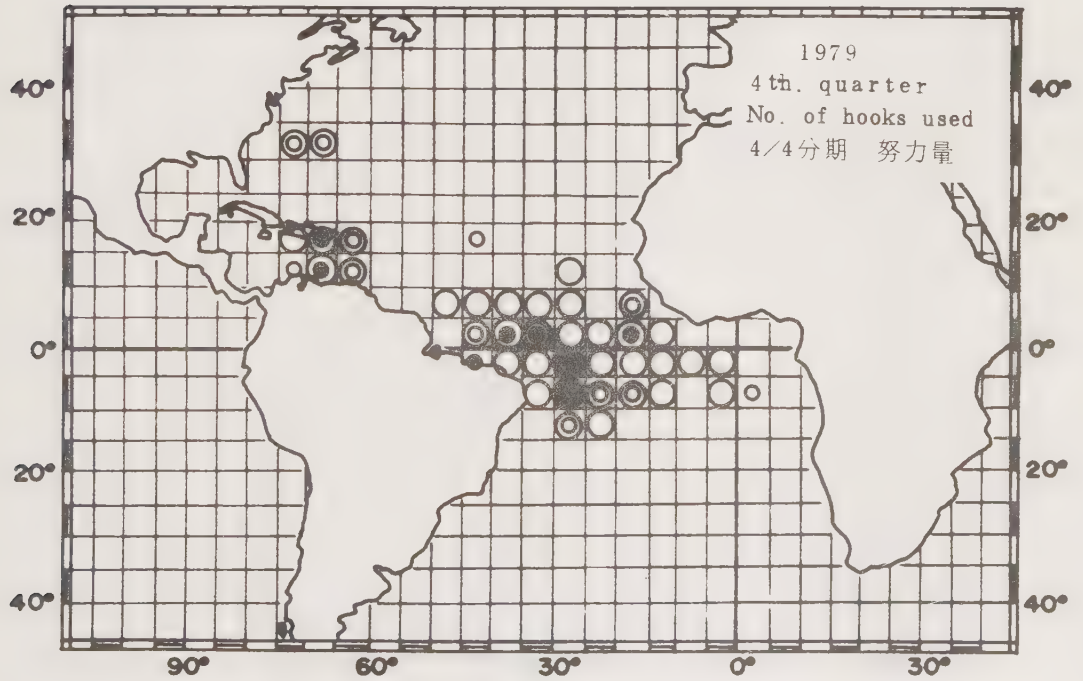

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
2nd. quarter
Hook rate of all species
2/4 分期 釣獲率

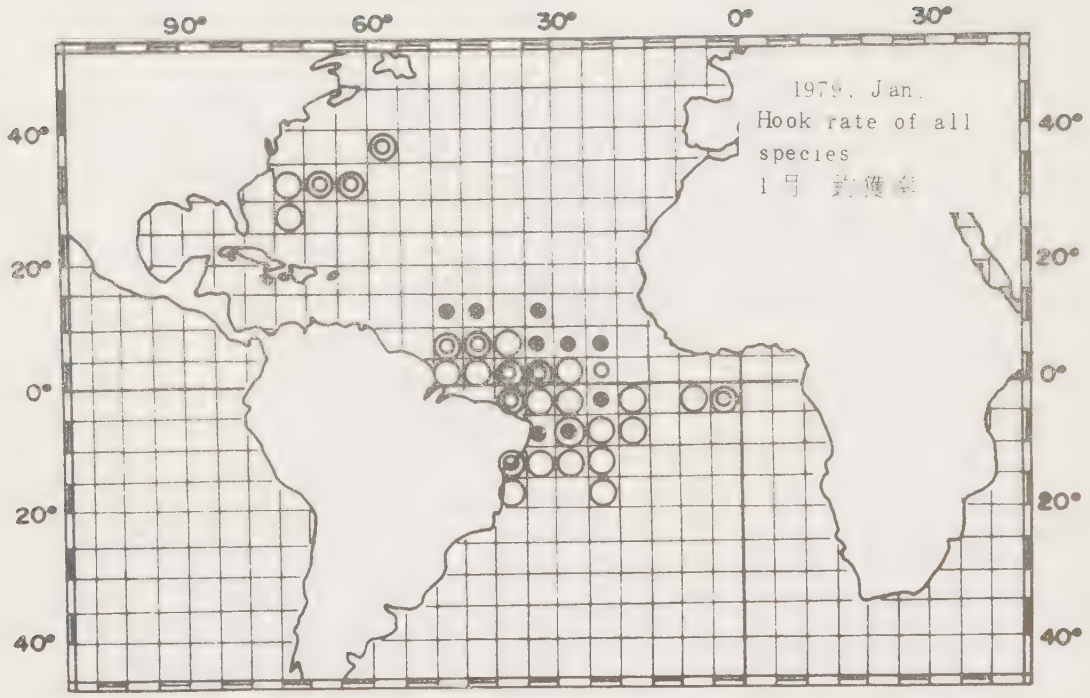

1979
2nd. quarter
No. of hooks used
2/4 分期 努力量
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

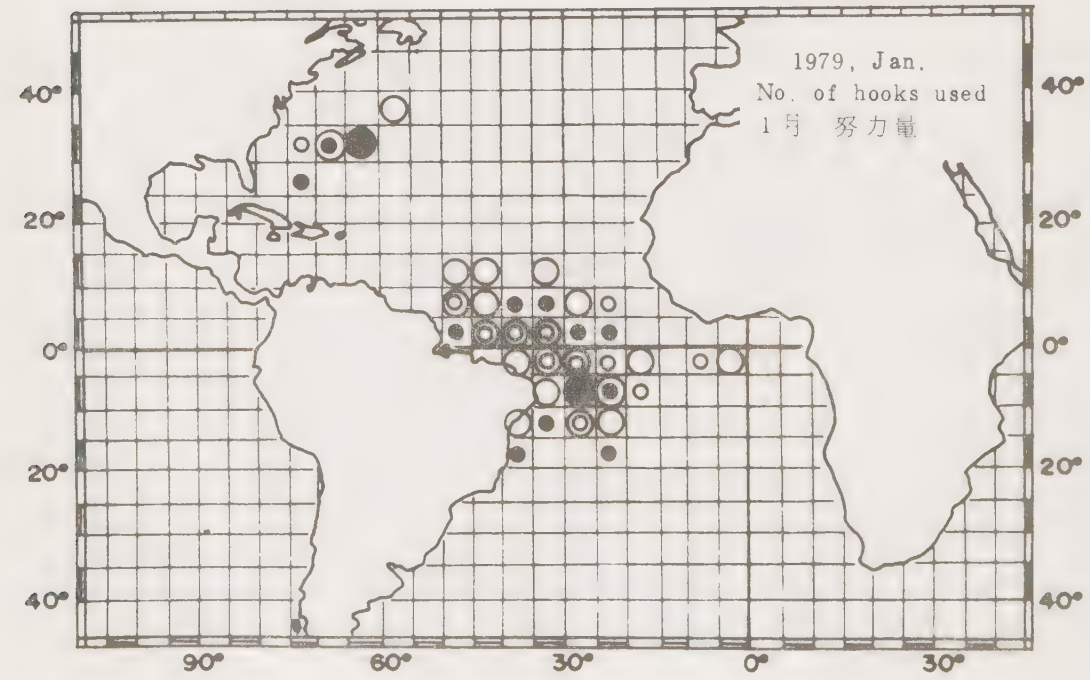

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
3rd quarser
Hook rate of all
species
3 4 分期 釣獲率

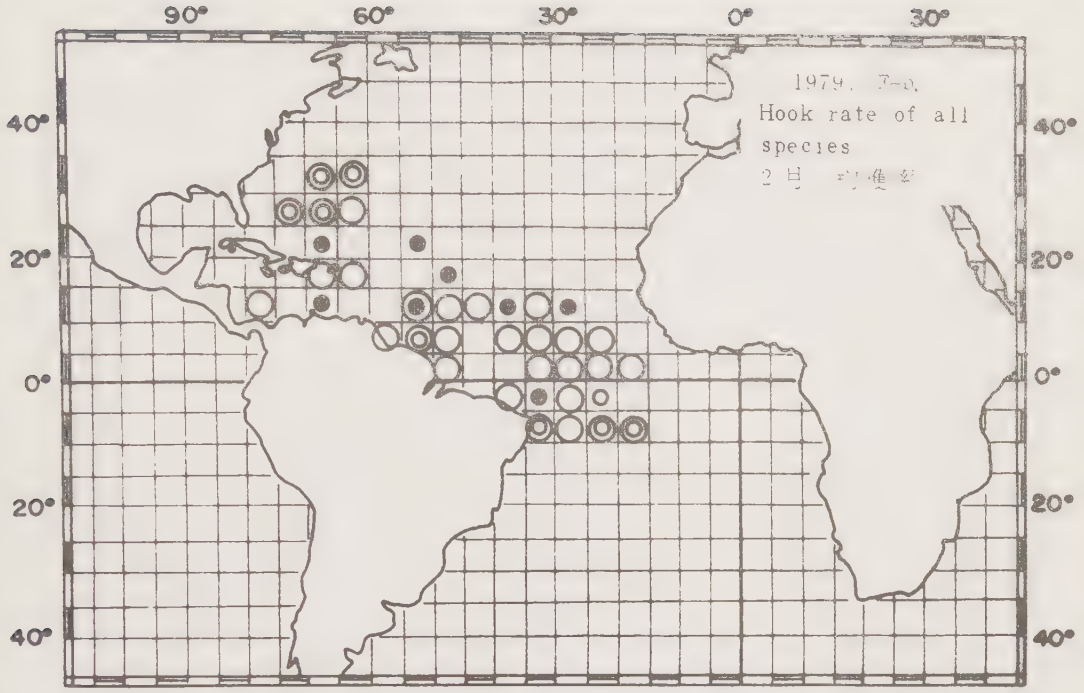

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
3rd. quarter
No. of hooks used
3/4 分期 努力量

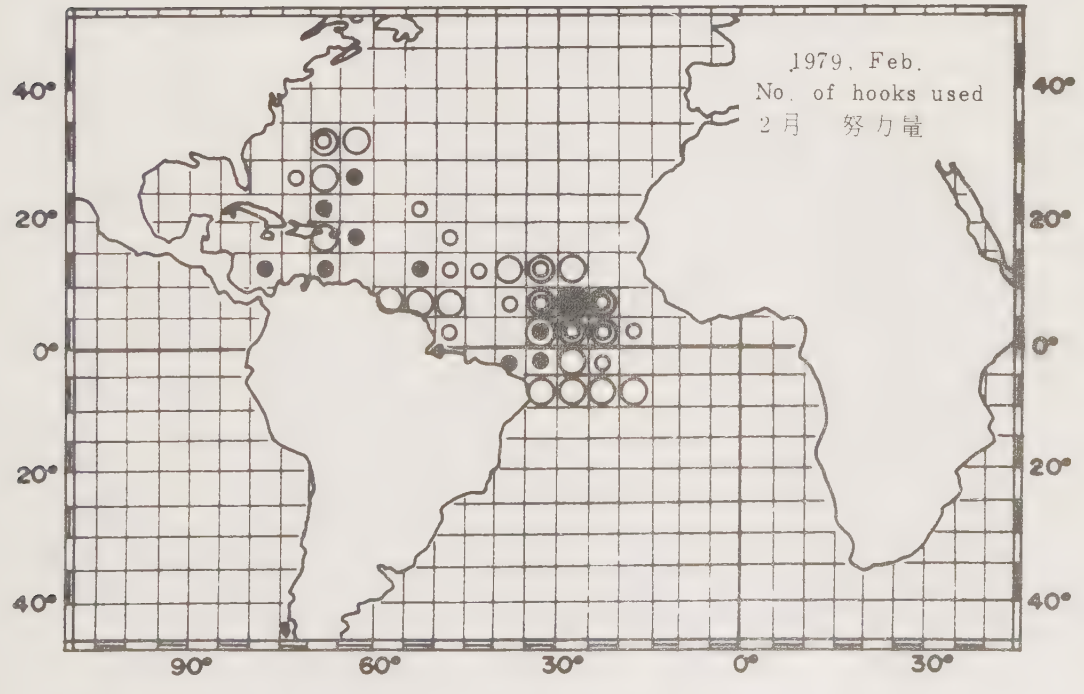

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
4th. quarter
Hook rate of all species
4/4分期 釣獲率

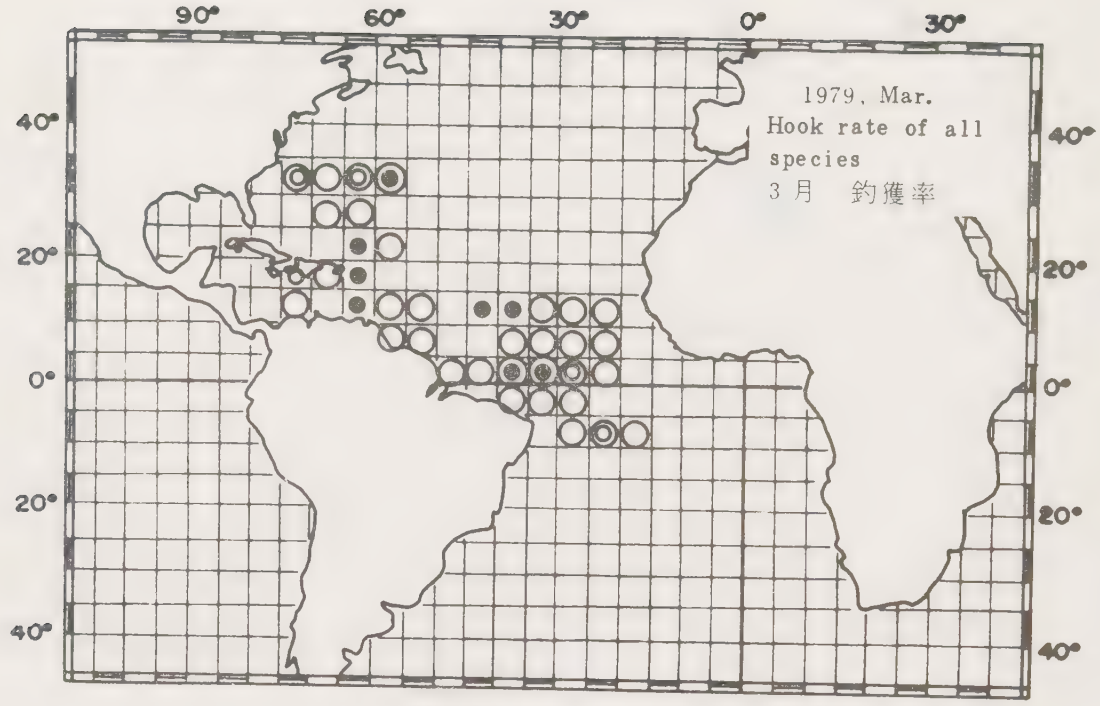

1979
4th. quarter
No. of hooks used
4/4分期 努力量
90°
60°
30°
0°
30°
40°
20°
0°
20°
40°

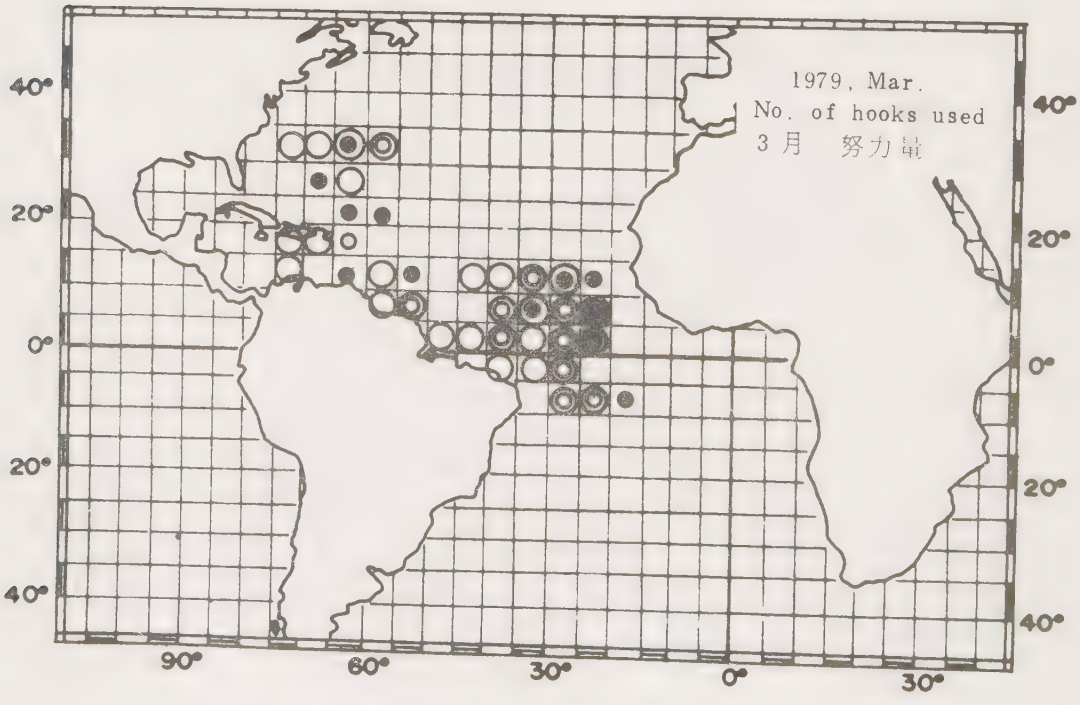

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Jan.
Hook rate of all species
1号 釣獲率

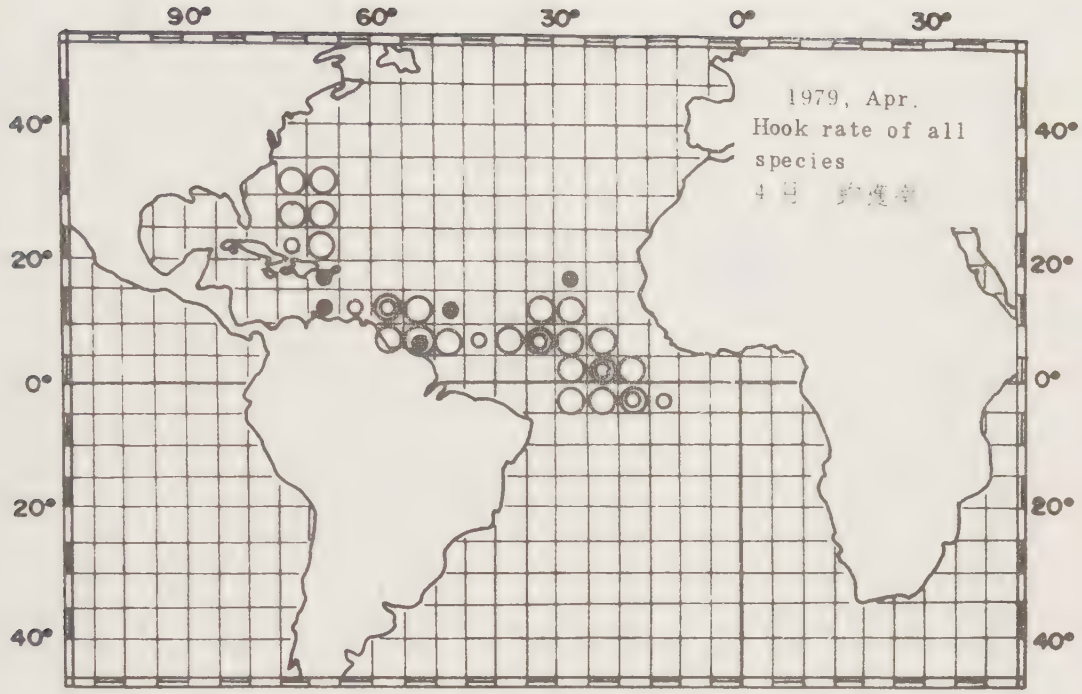

40°
20°
0°
20°
40°
1979, Jan.
No. of hooks used
1号 努力量
90°
60°
30°
0°
30°

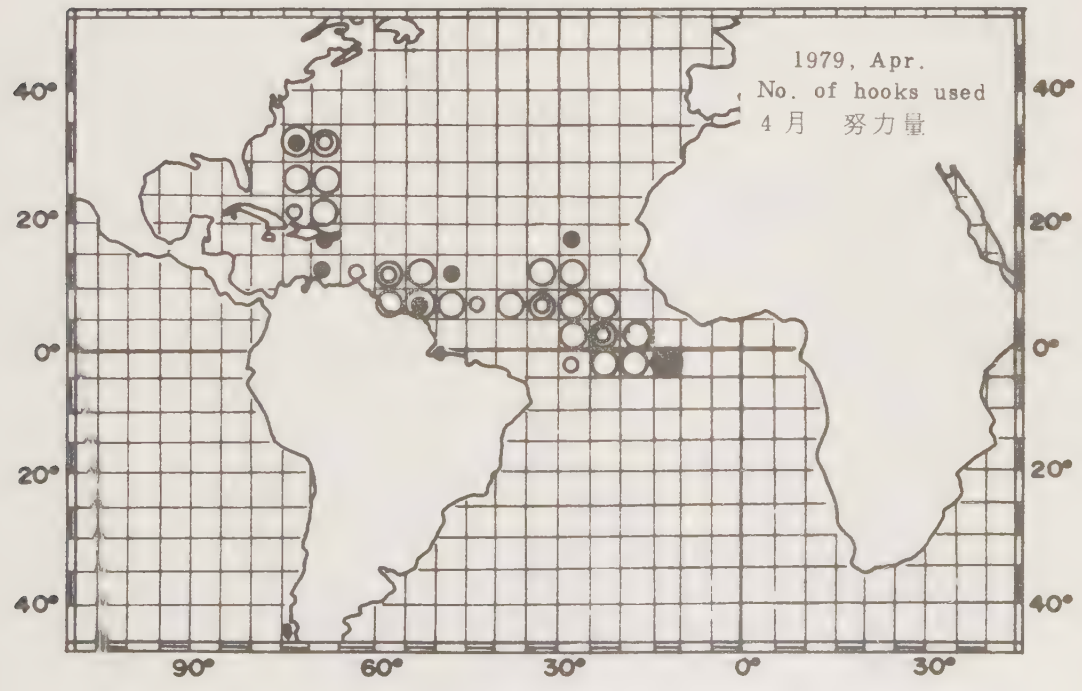

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Feb.
Hook rate of all species
2月 全魚種

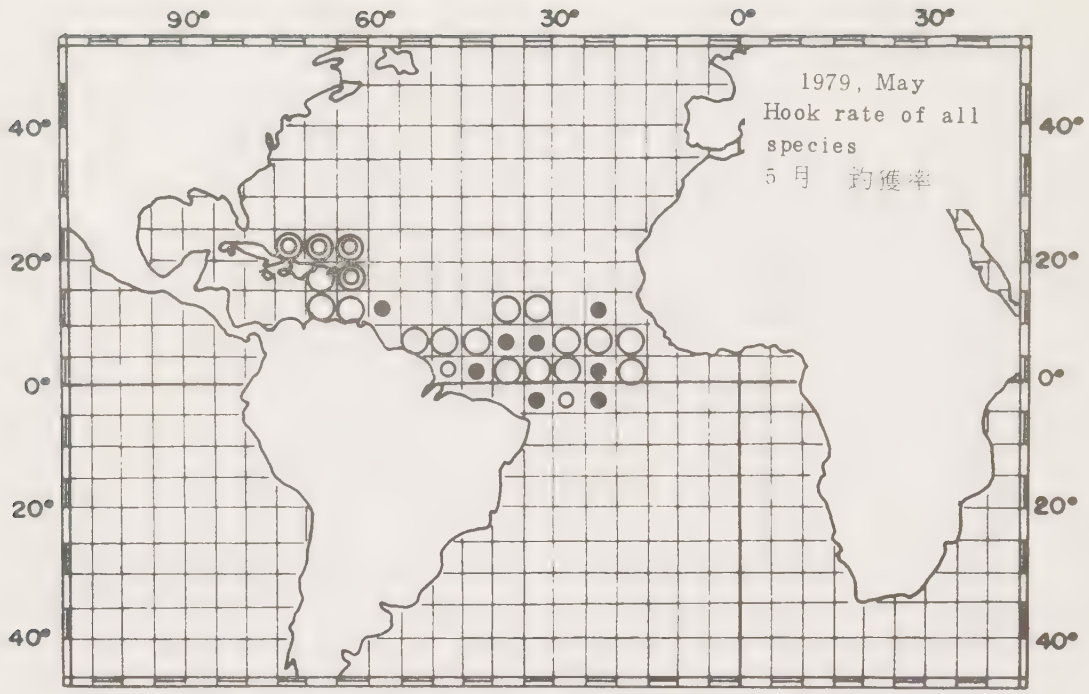

40°
20°
0°
20°
40°
1979, Feb.
No. of hooks used
2月 努力量
90°
60°
30°
0°
30°

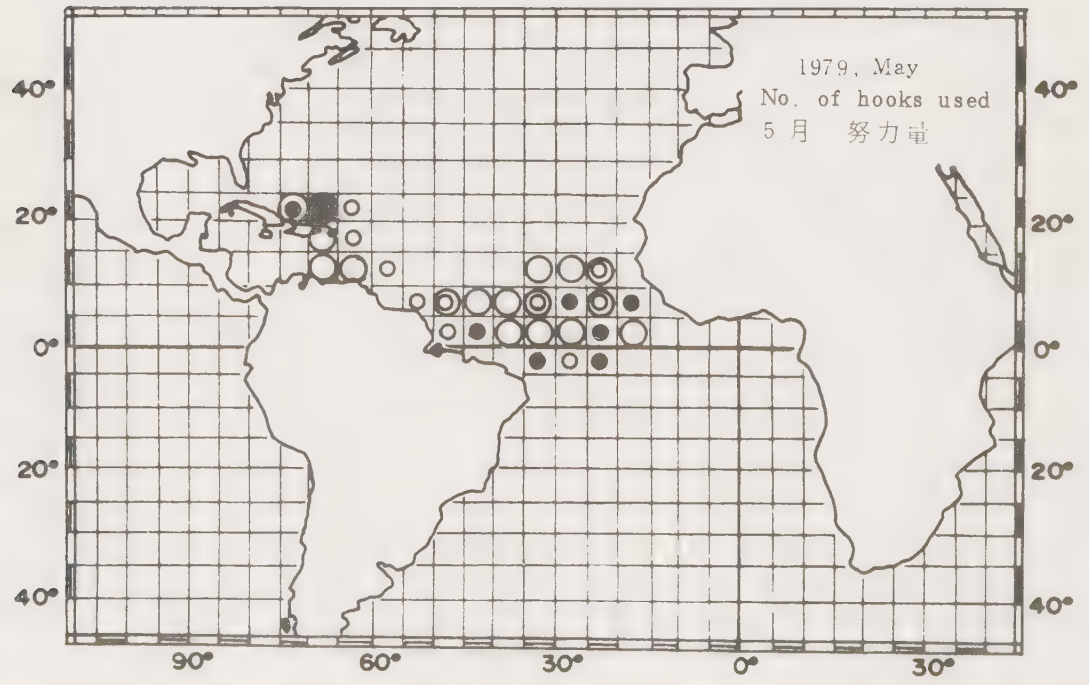

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Mar.
Hook rate of all species
3月　釣獲率

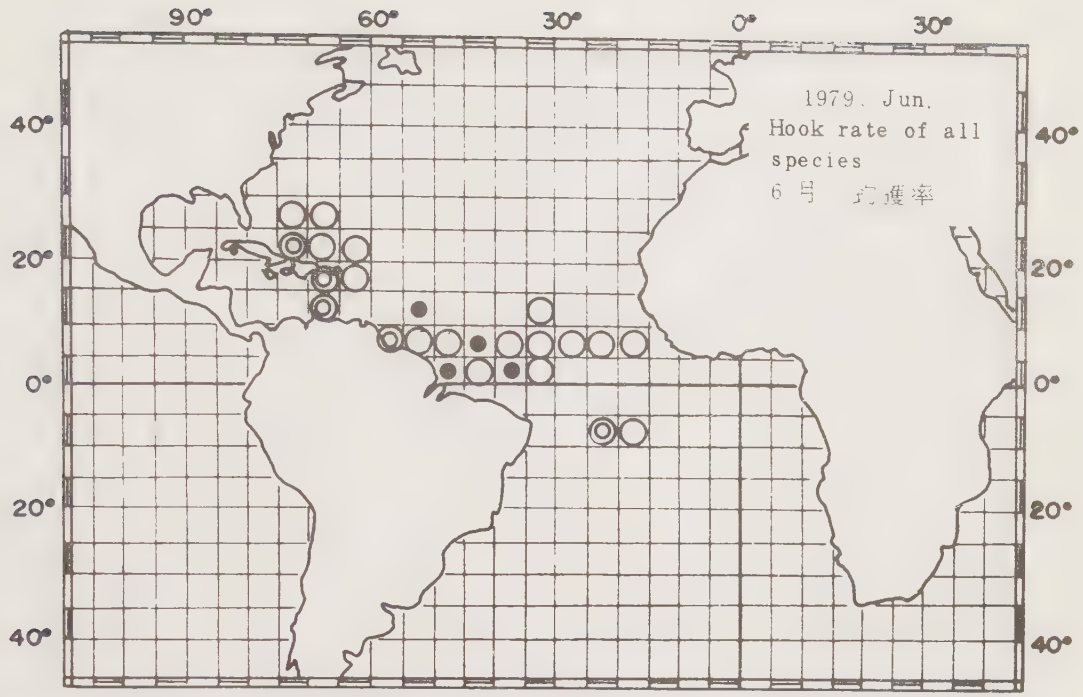

40°
20°
0°
20°
40°
90°
60°
30°
0°
30°
1979, Mar.
No. of hooks used
3月　努力量

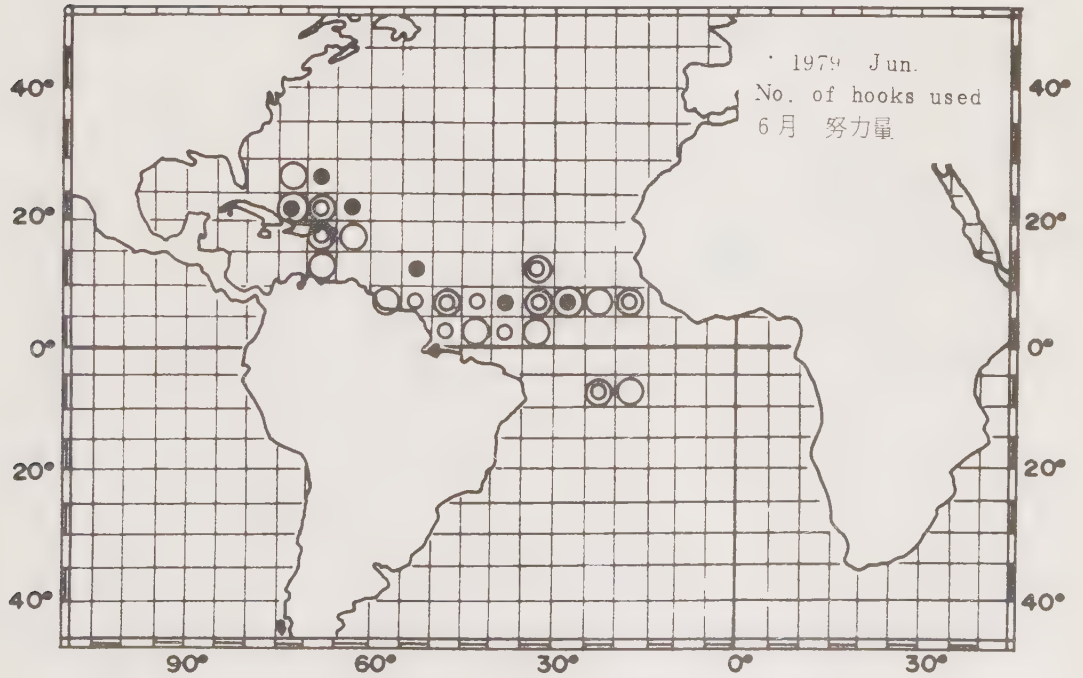

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Apr.
Hook rate of all
species
4月 釣獲率

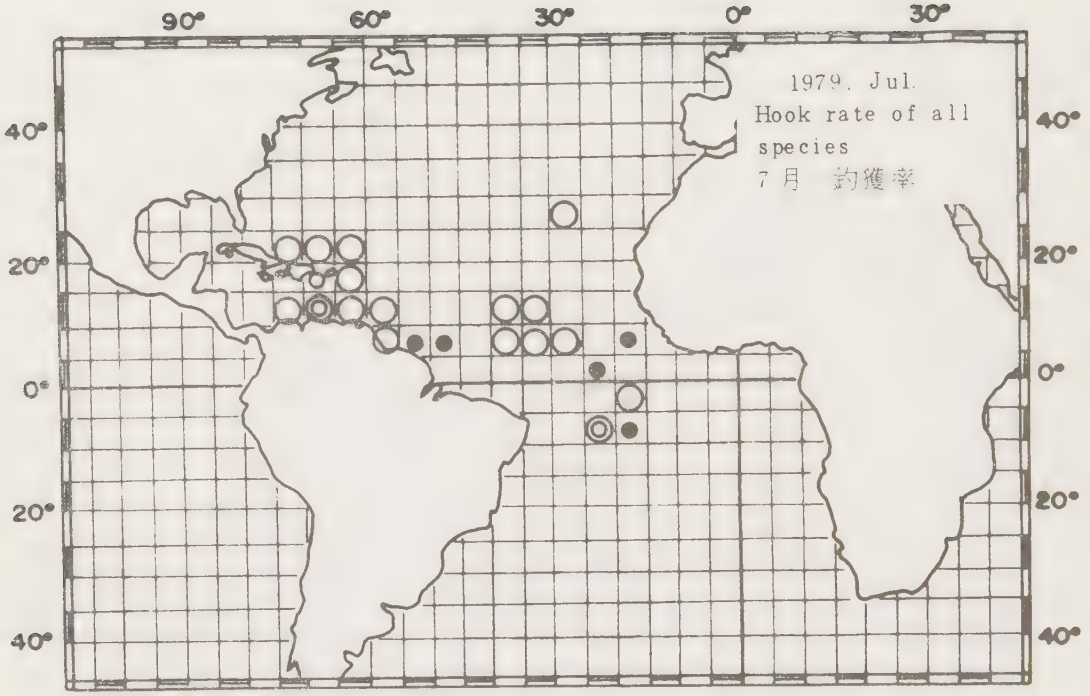

40°
20°
0°
20°
40°
1979, Apr.
No. of hooks used
4月 努力量
90°
60°
30°
0°
30°

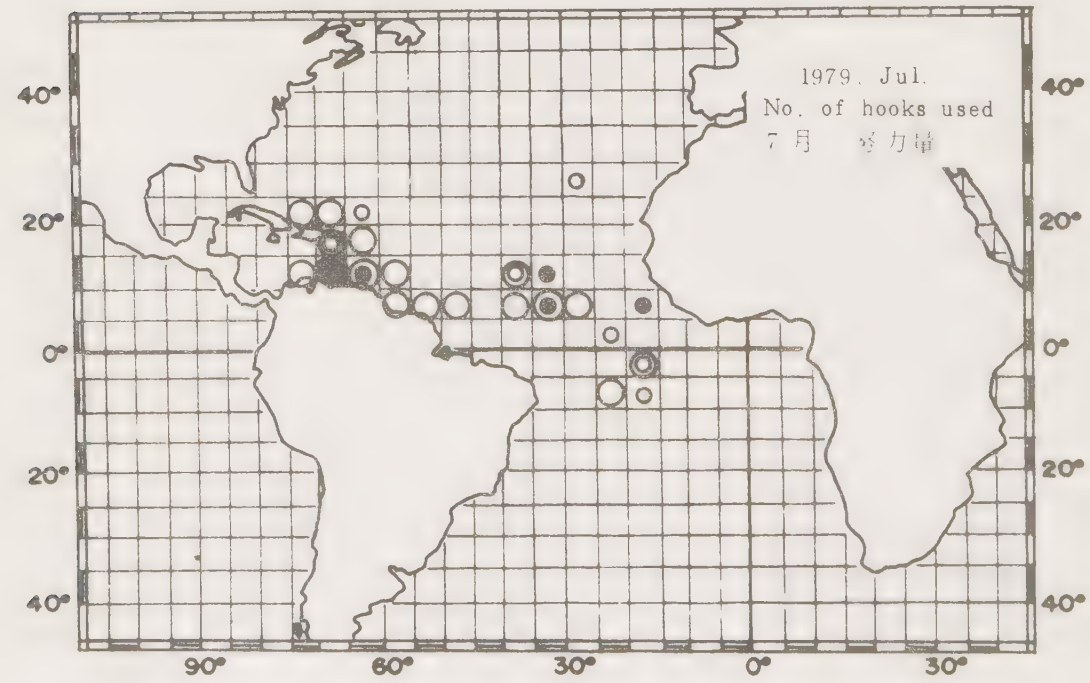

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, May
Hook rate of all species
5月　釣獲率

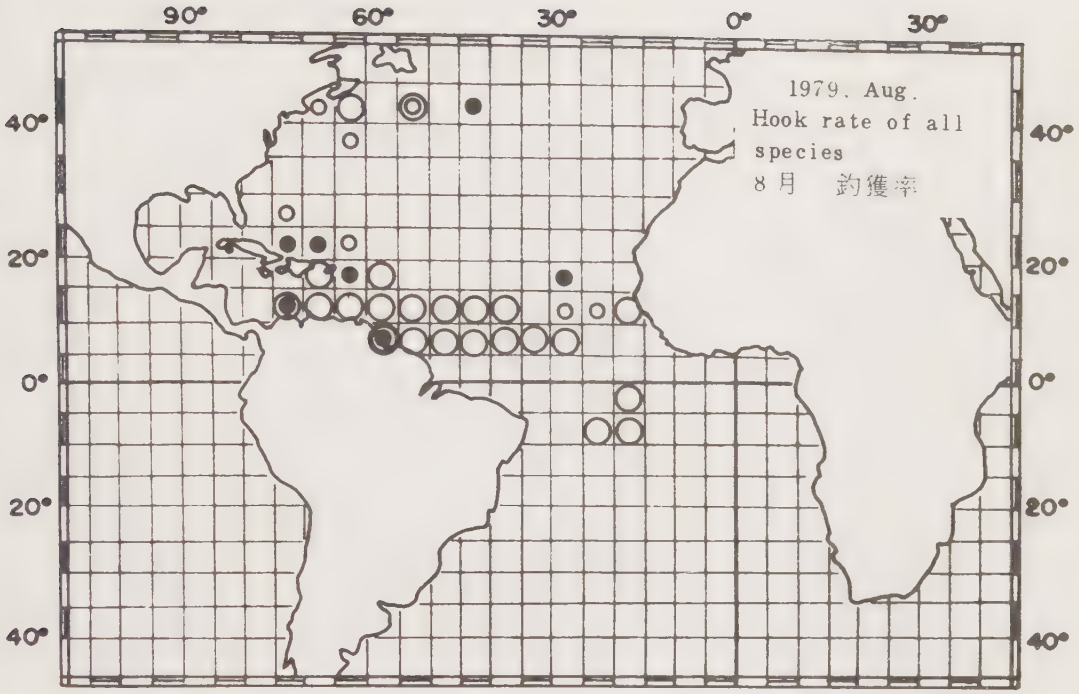

40°
20°
0°
20°
40°
1979, May
No. of hooks used
5月　努力量
90°
60°
30°
0°
30°

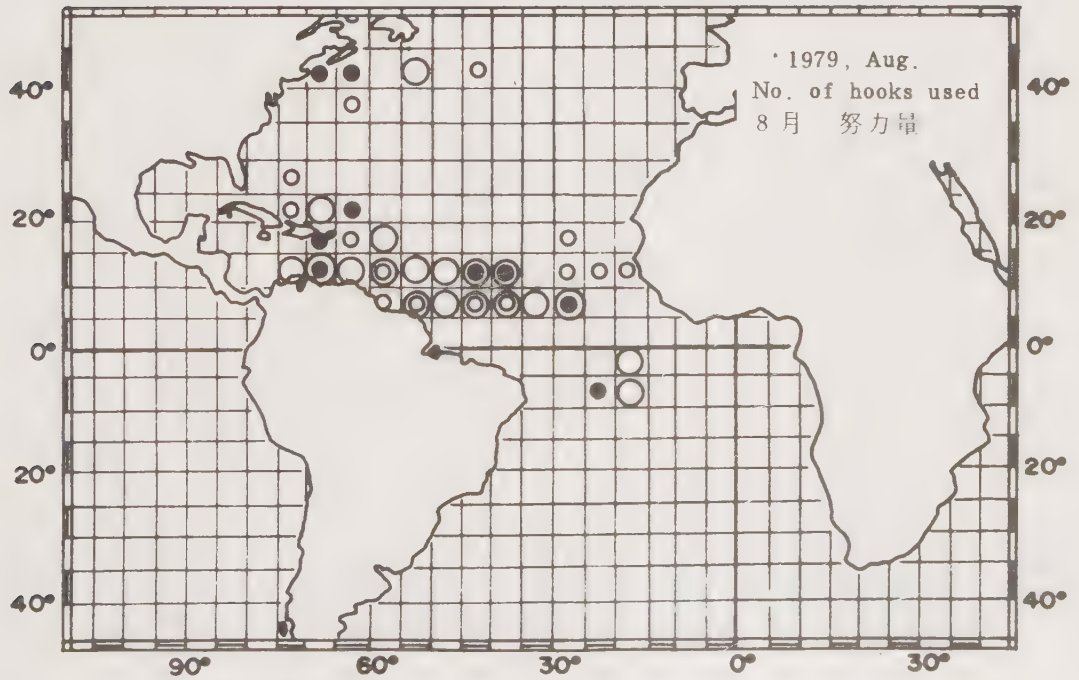

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. Jun.
Hook rate of all species
6 号 釣獲率

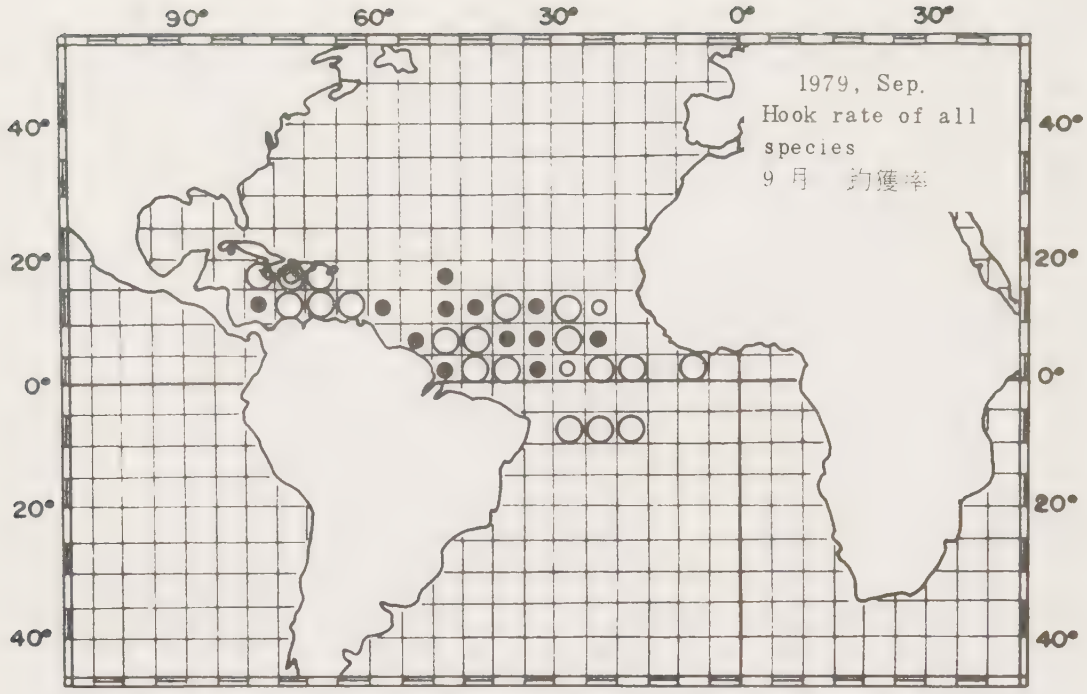

1979 Jun.
No. of hooks used
6月 努力量
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

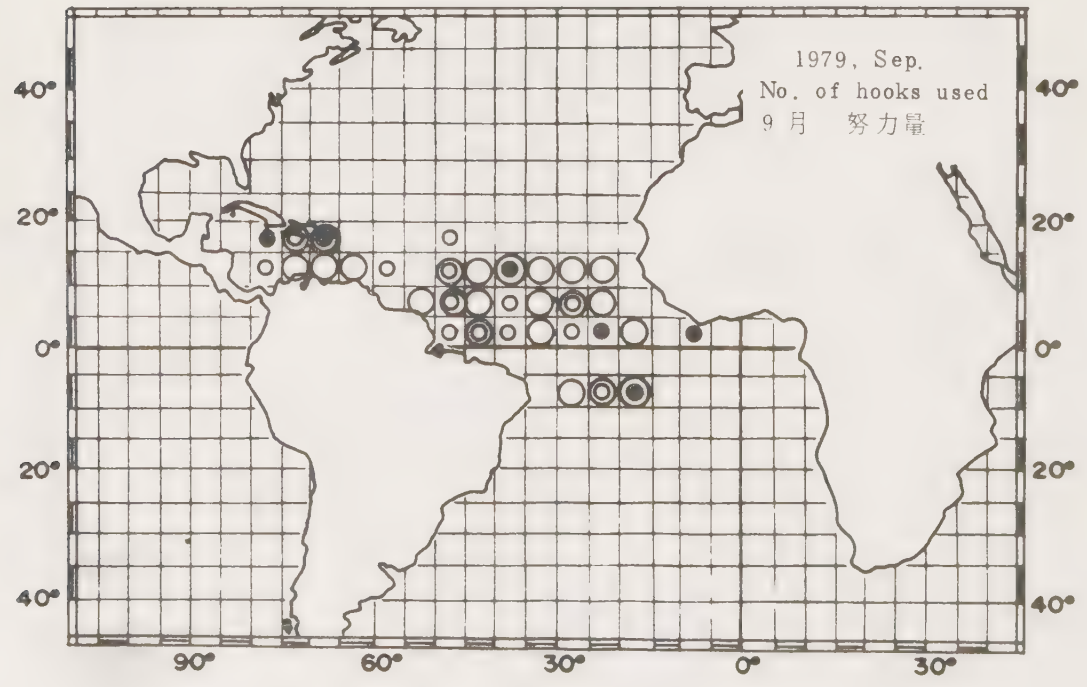

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. Jul.
Hook rate of all species
7月 釣獲率

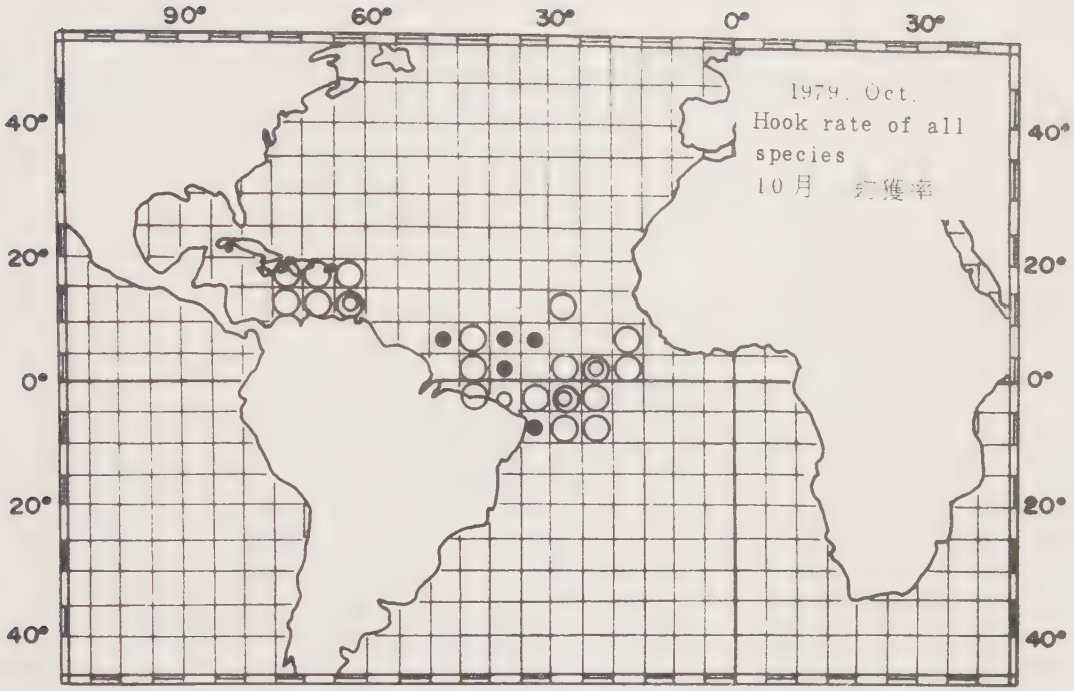

40°
20°
0°
20°
40°
1979. Jul.
No. of hooks used
7月 努力量
90°
60°
30°
0°
30°

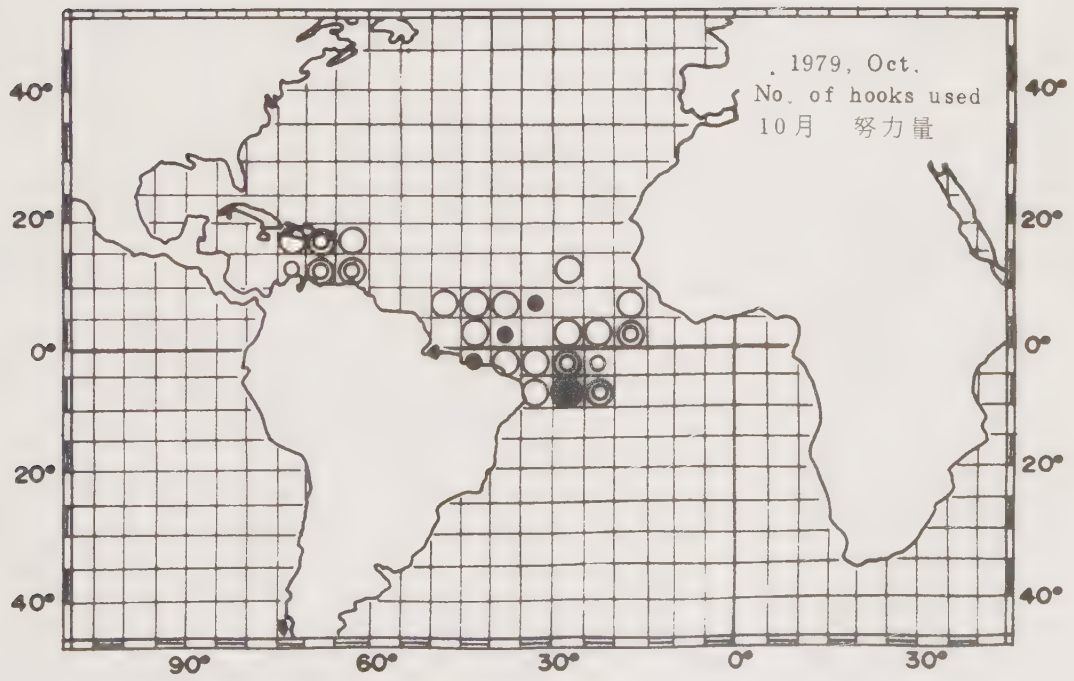

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. Aug.
Hook rate of all species
8月　釣獲率

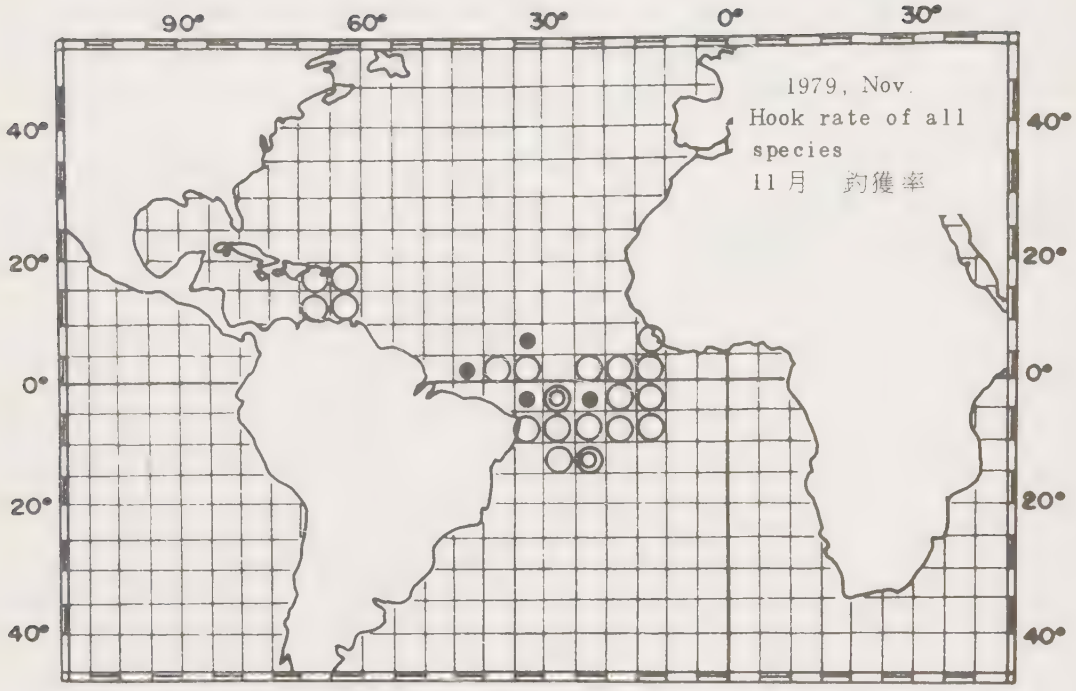

1979, Aug.
No. of hooks used
8月　努力量
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

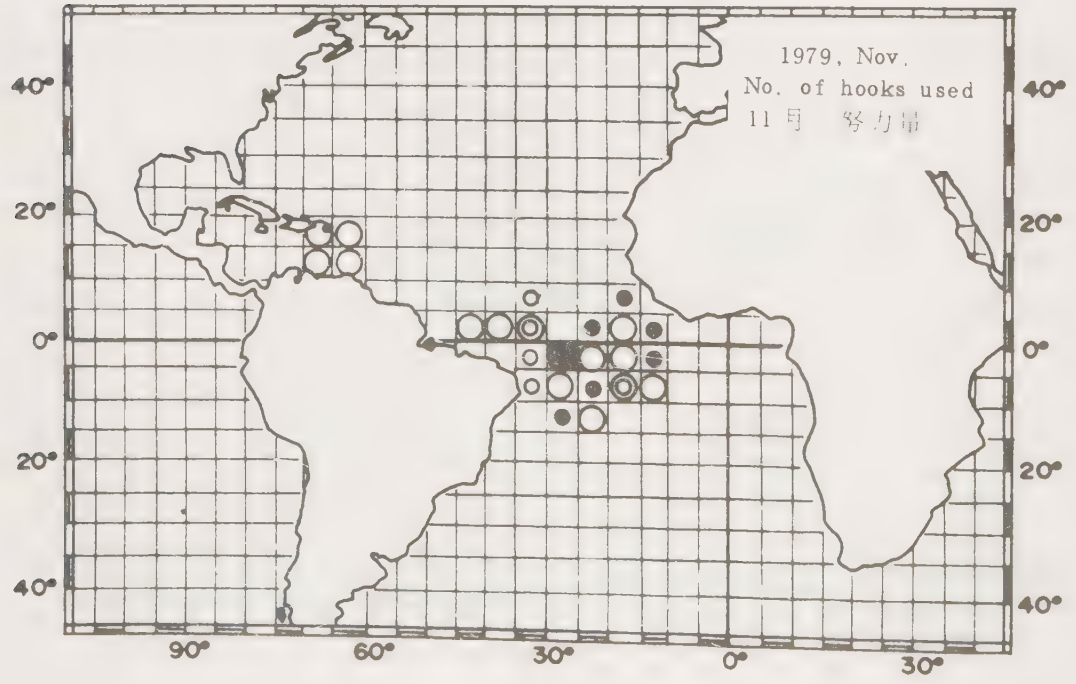

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Sep.
Hook rate of all species
9月 釣獲率

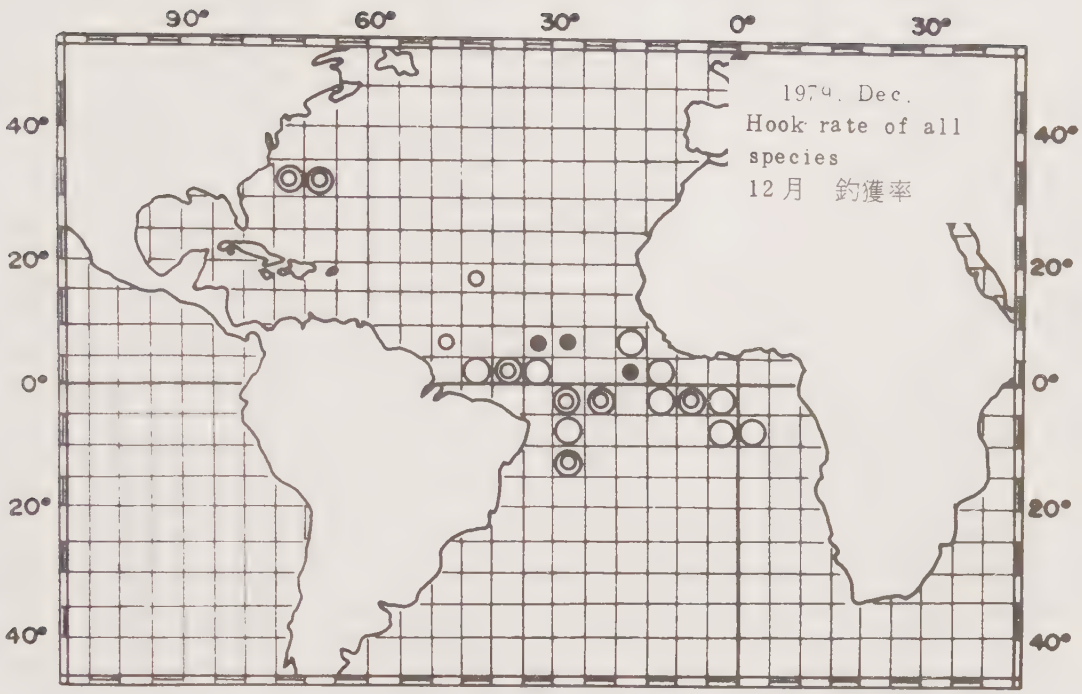

1979, Sep.
No. of hooks used
9月 努力量
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

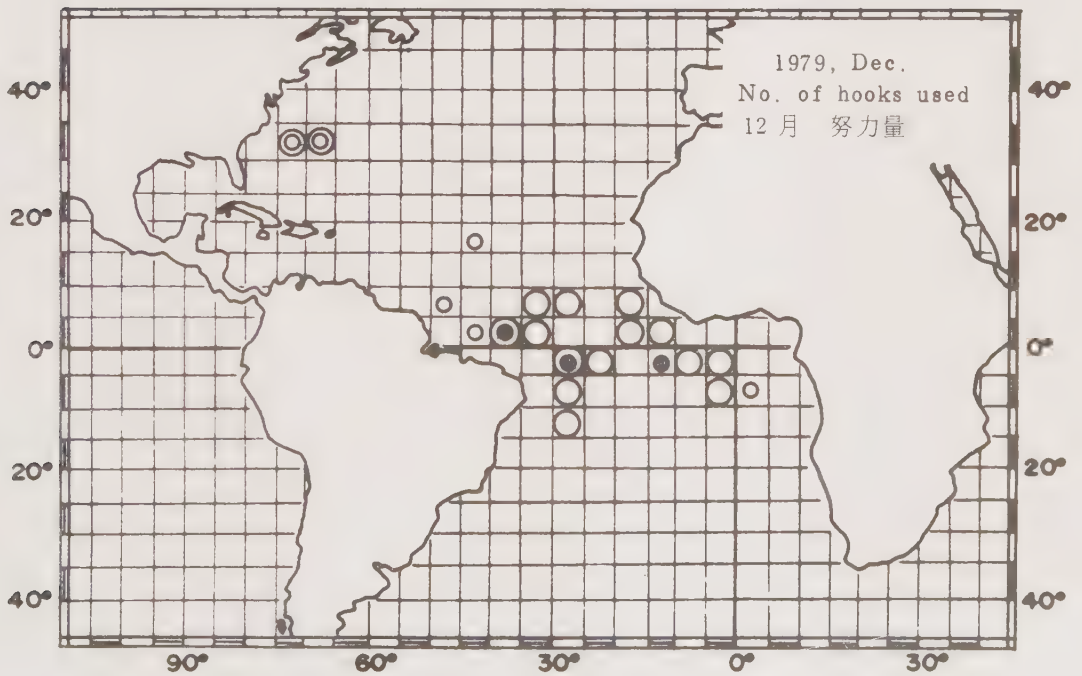

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Oct.
Hook rate of all species
10月 釣獲率


1979, Oct.
No. of hooks used
10月 努力量
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°


90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Nov.
Hook rate of all species
11月　釣獲率


1979, Nov.
No. of hooks used
11月　努力量
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°


90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Dec.
Hook rate of all species
12月　釣獲率

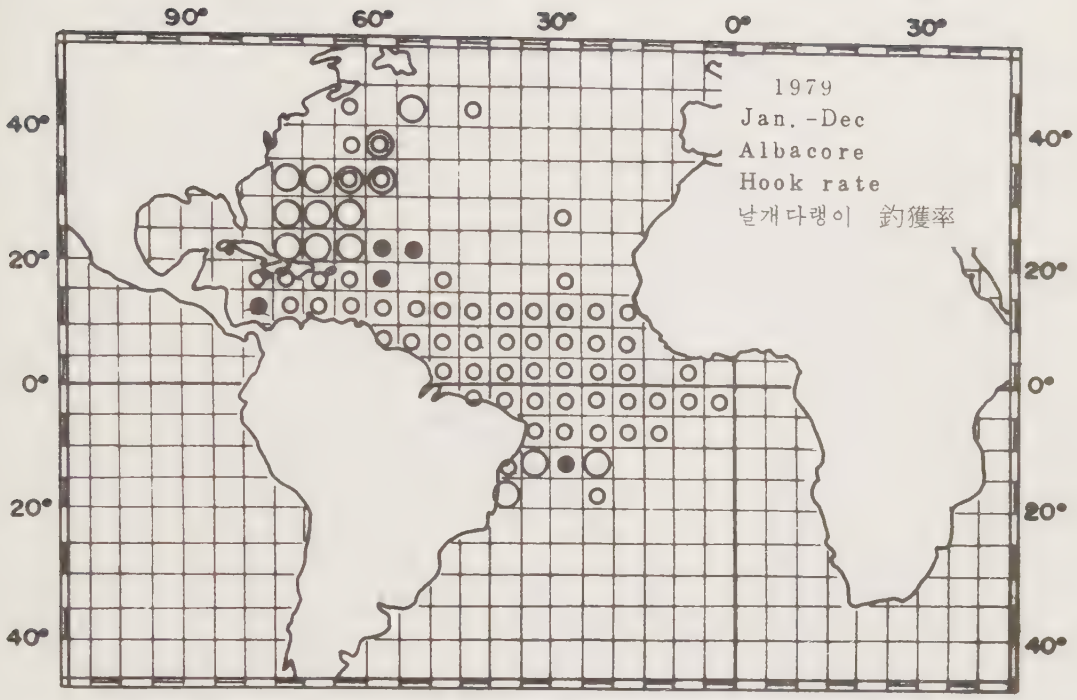

1979, Dec.
No. of hooks used
12月　努力量
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

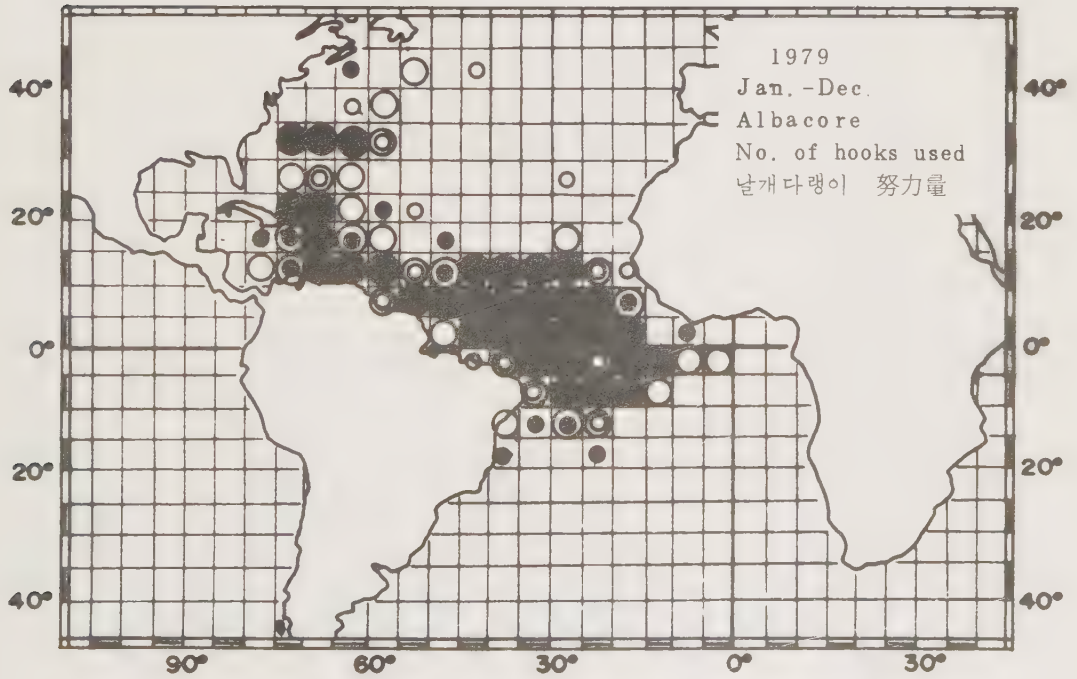
날개다랭이, 황다랭이, 눈다랭이
釣獲率 및 漁獲努力 分布圖

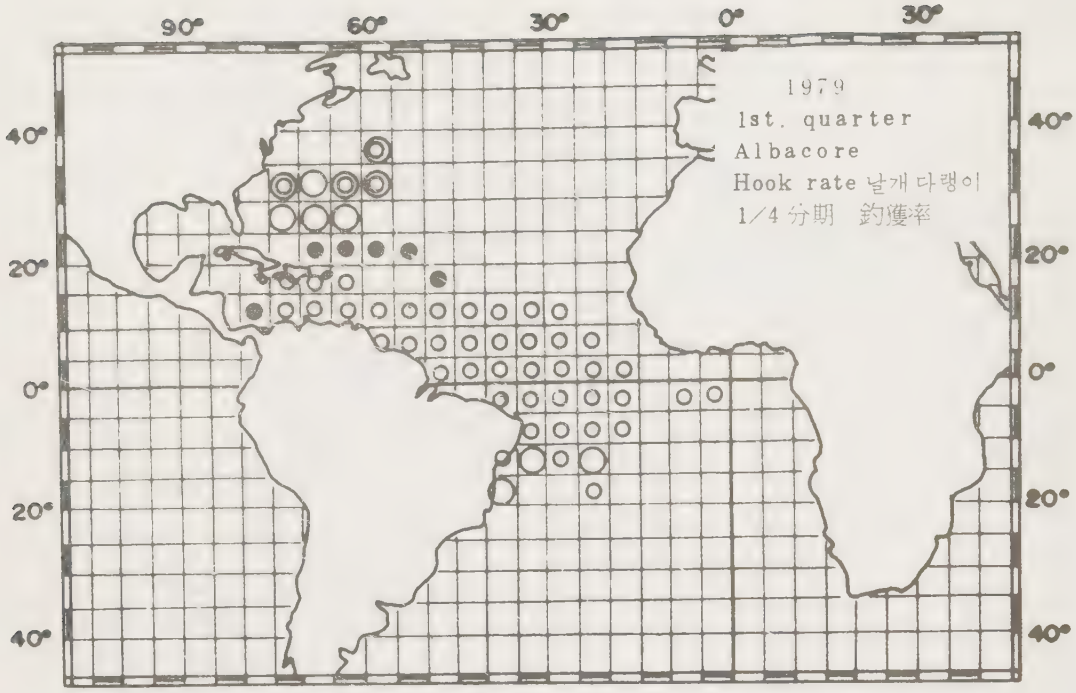
Albacore, Yellowfin, Bigeye
Hook rate and fishing effort

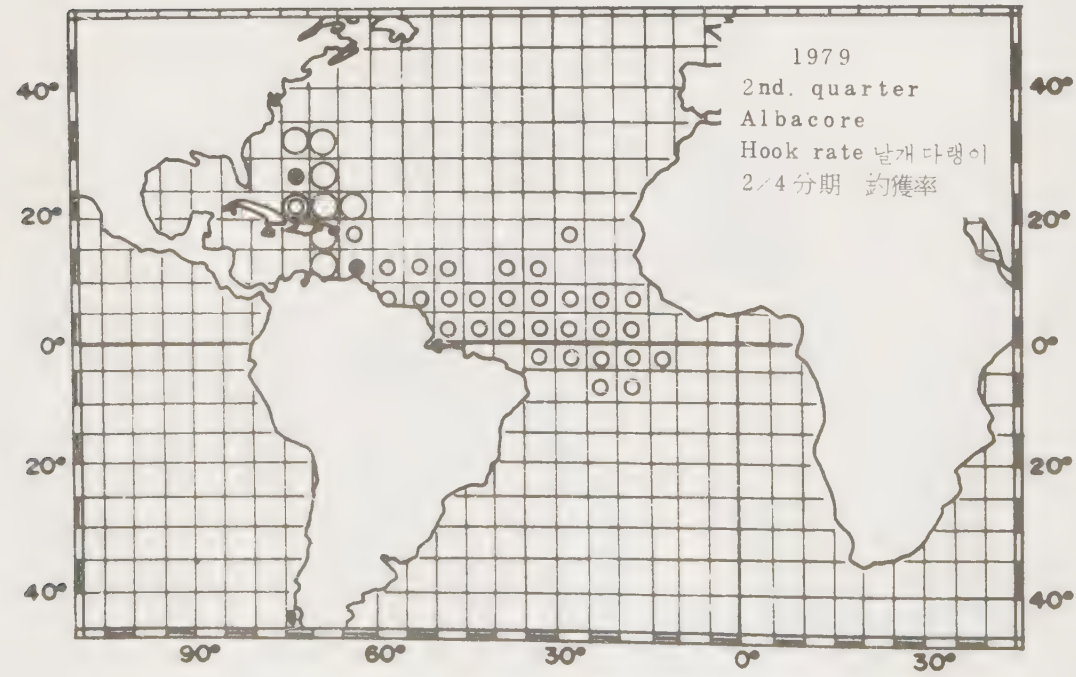
날 개 다 랭 이

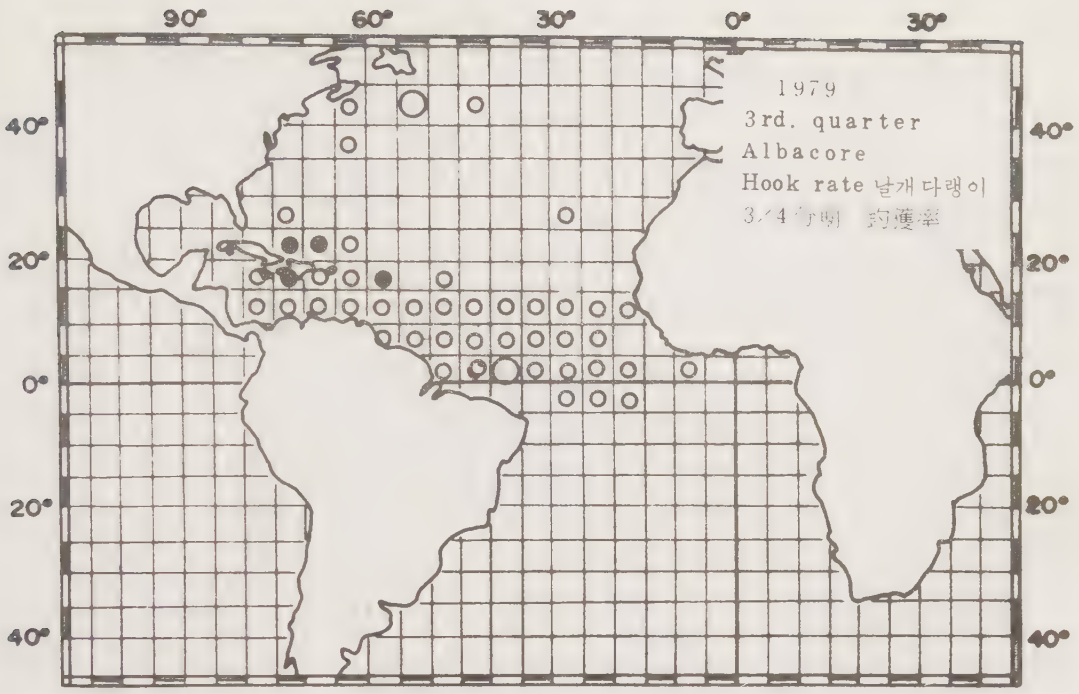
Albacore

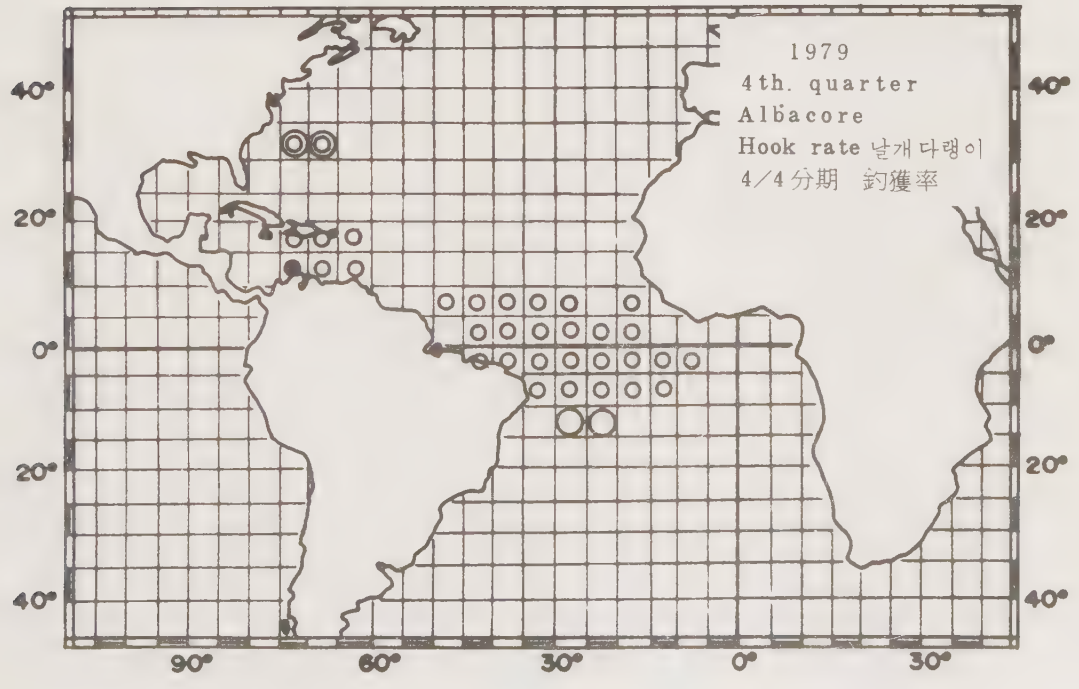

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
Jan.-Dec
Albacore
Hook rate
날개다랑이 釣獲率

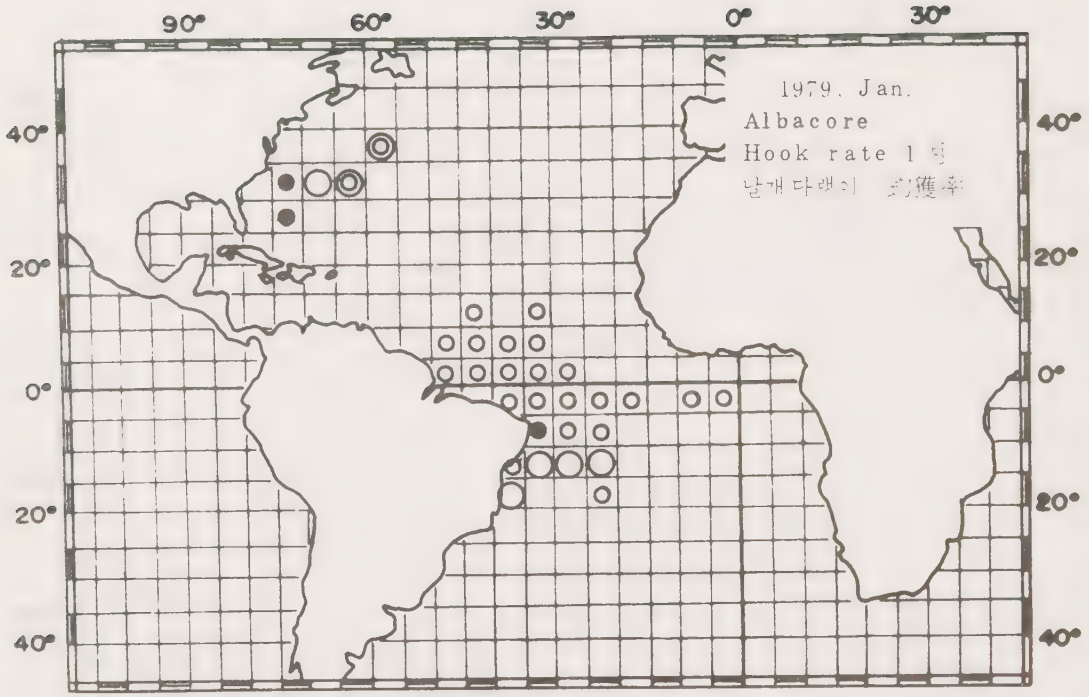

40°
20°
0°
20°
40°
1979
Jan.-Dec.
Albacore
No. of hooks used
날개다랑이 努力量
90°
60°
30°
0°
30°

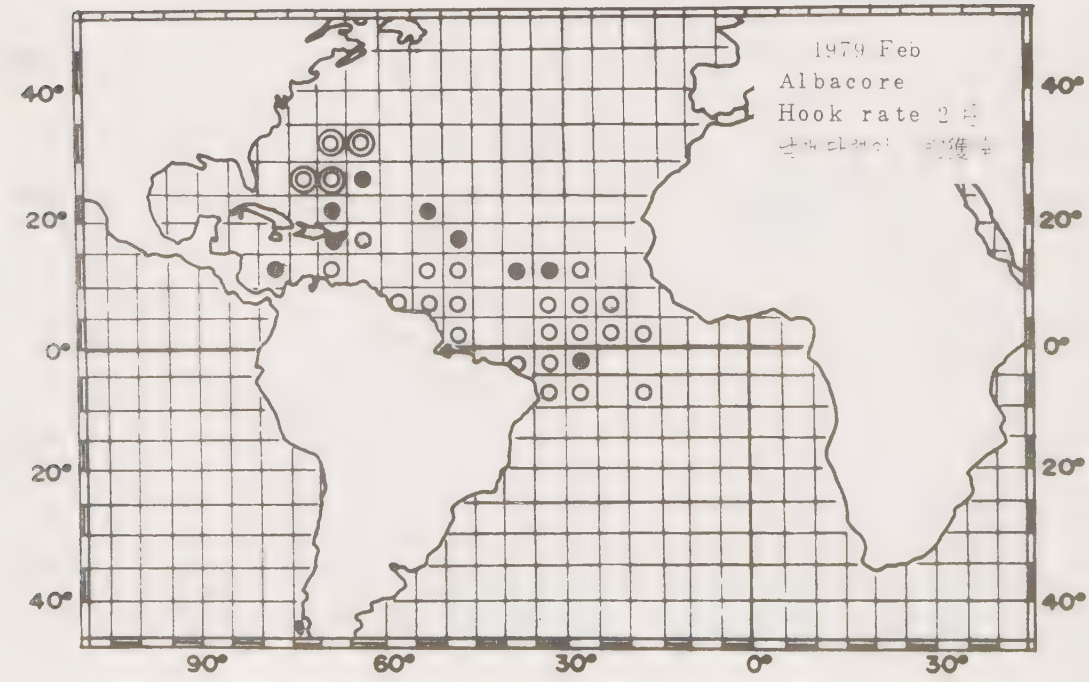

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
1st. quarter
Albacore
Hook rate 날개다랑이
1/4 分期 釣獲率

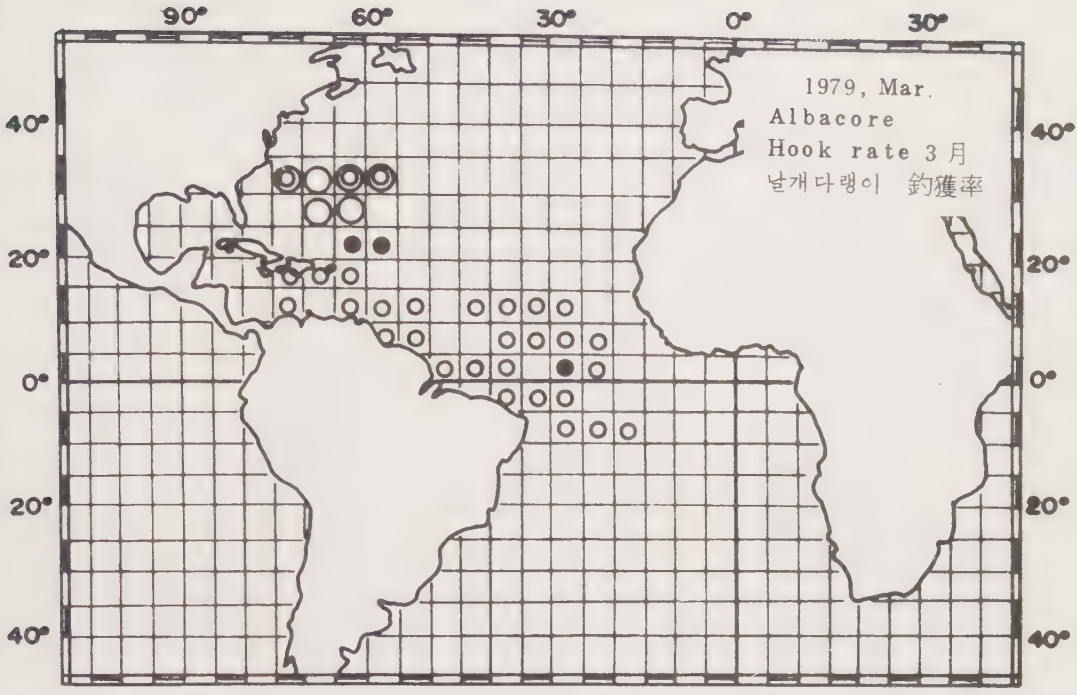

1979
2nd. quarter
Albacore
Hook rate 날개다랑이
2/4 分期 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

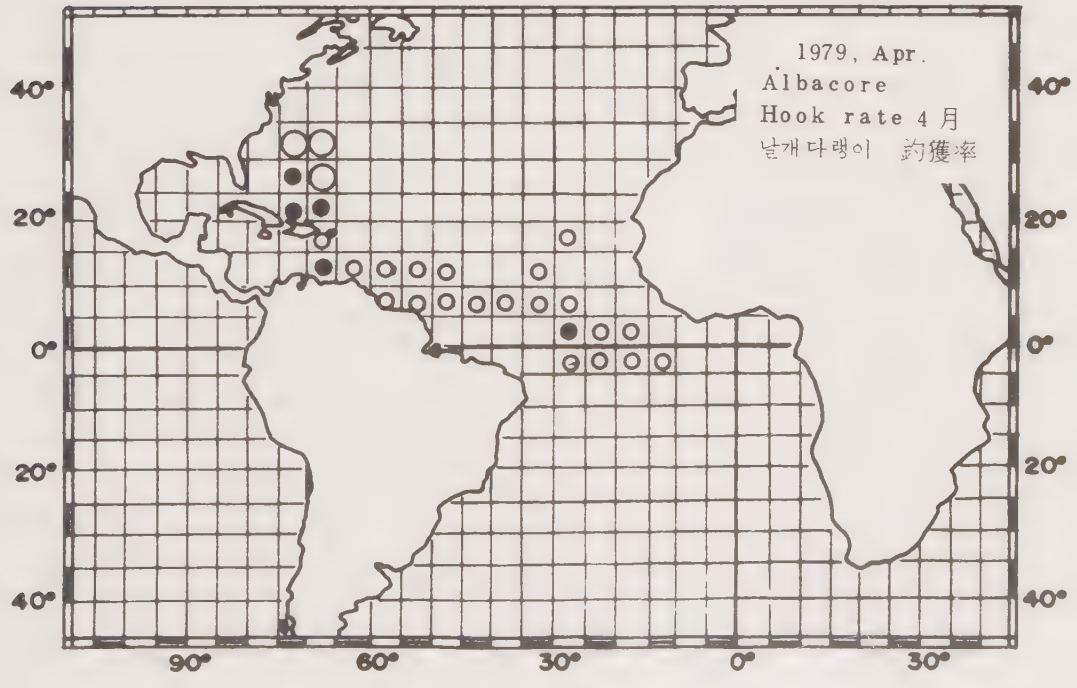

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
3rd. quarter
Albacore
Hook rate 날개다랑이
3/4 分期 釣獲率

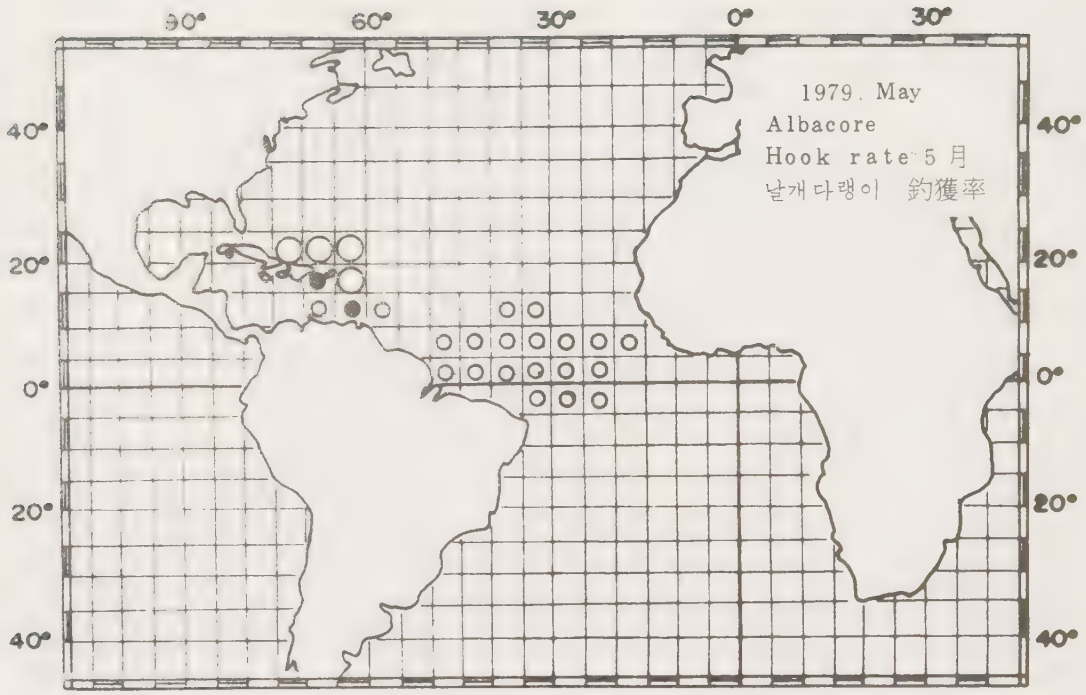

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
4th. quarter
Albacore
Hook rate 날개다랑이
4/4 分期 釣獲率

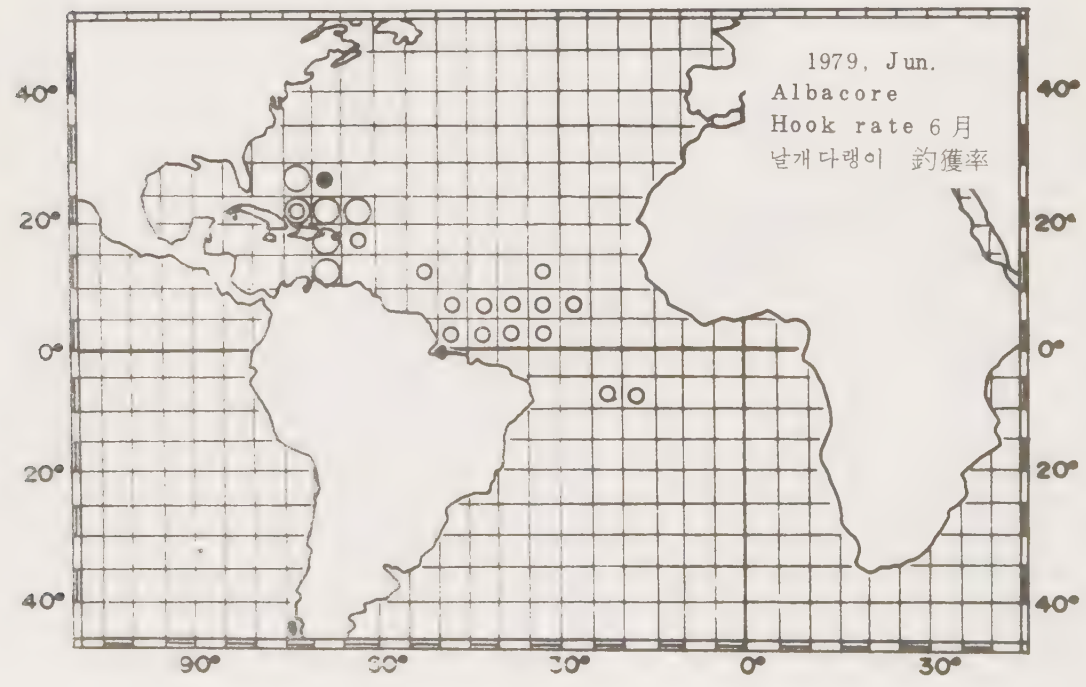

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. Jan.
Albacore
Hook rate 1 %

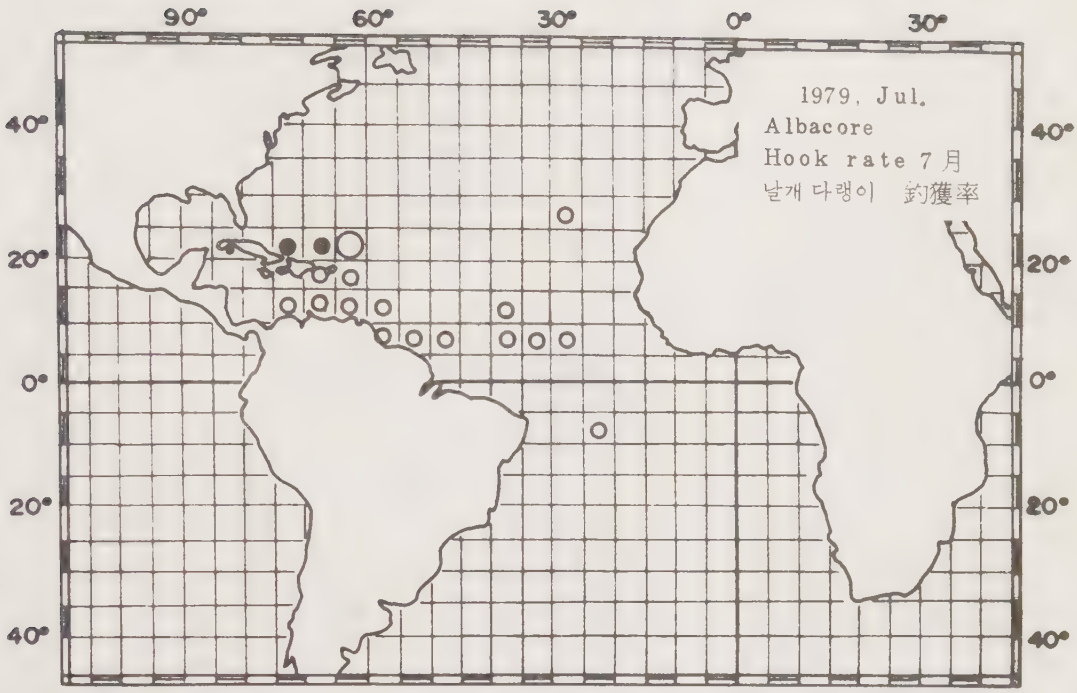

1979 Feb
Albacore
Hook rate 2 %
90°
60°
30°
0°
30°
40°
20°
0°
20°
40°

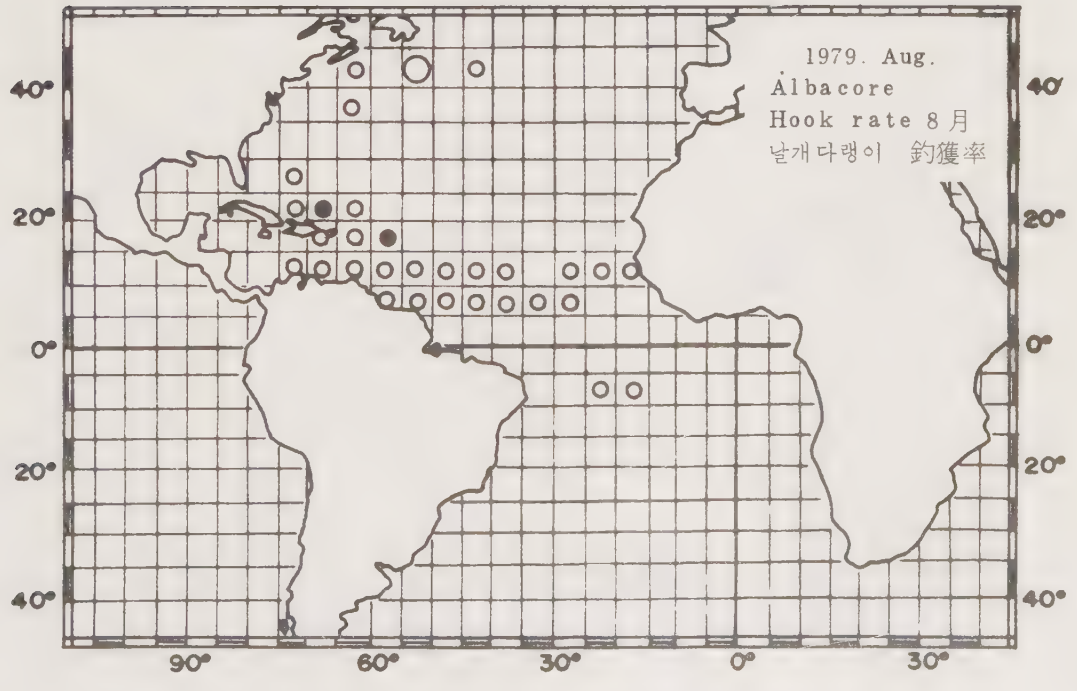

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Mar.
Albacore
Hook rate 3月
날개다랑이 釣獲率

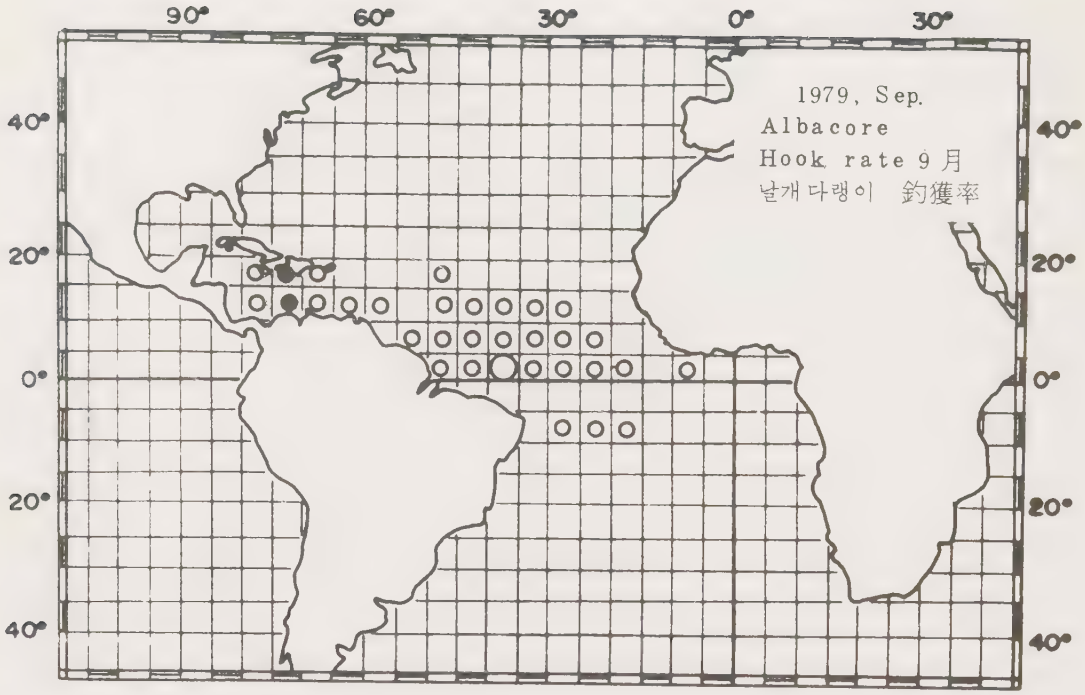

40°
20°
0°
20°
40°
1979, Apr.
Albacore
Hook rate 4月
날개다랑이 釣獲率
90°
60°
30°
0°
30°

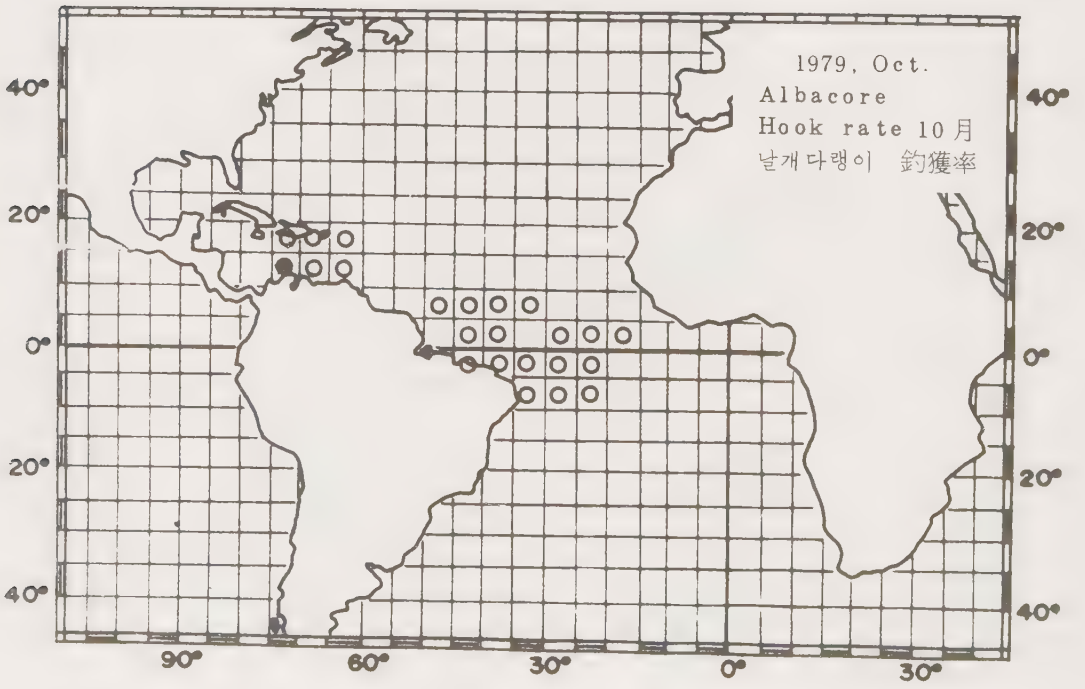

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. May
Albacore
Hook rate 5月
날개다랑이 釣獲率

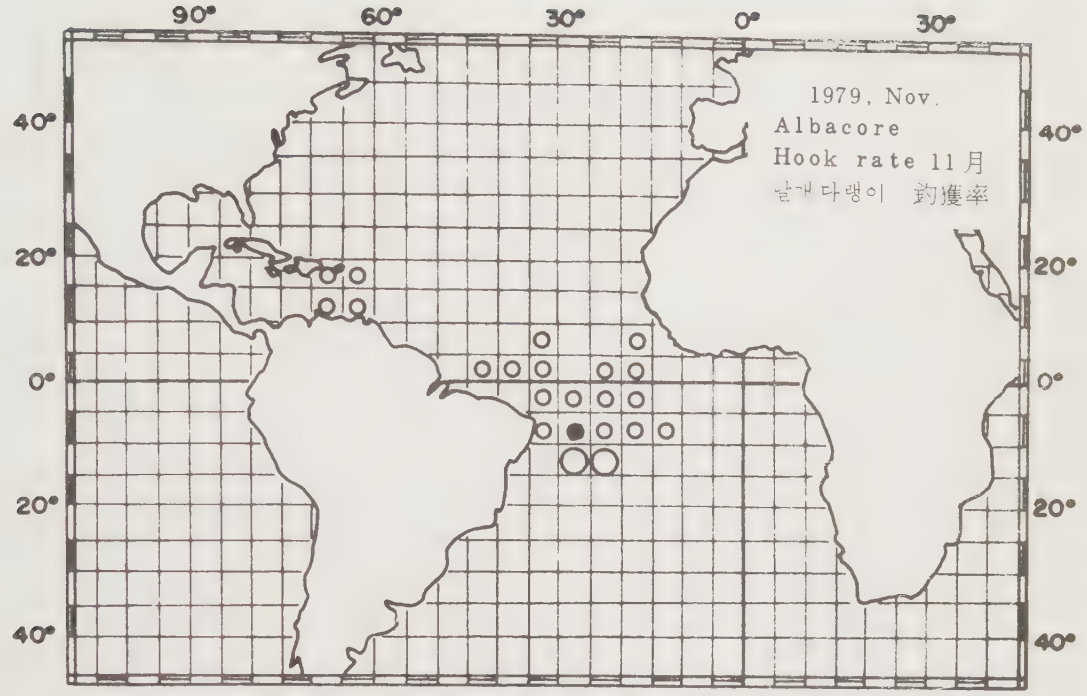

1979, Jun.
Albacore
Hook rate 6月
날개다랑이 釣獲率
40°
20°
0°
20°
40°
90°
30°
30°
0°
30°

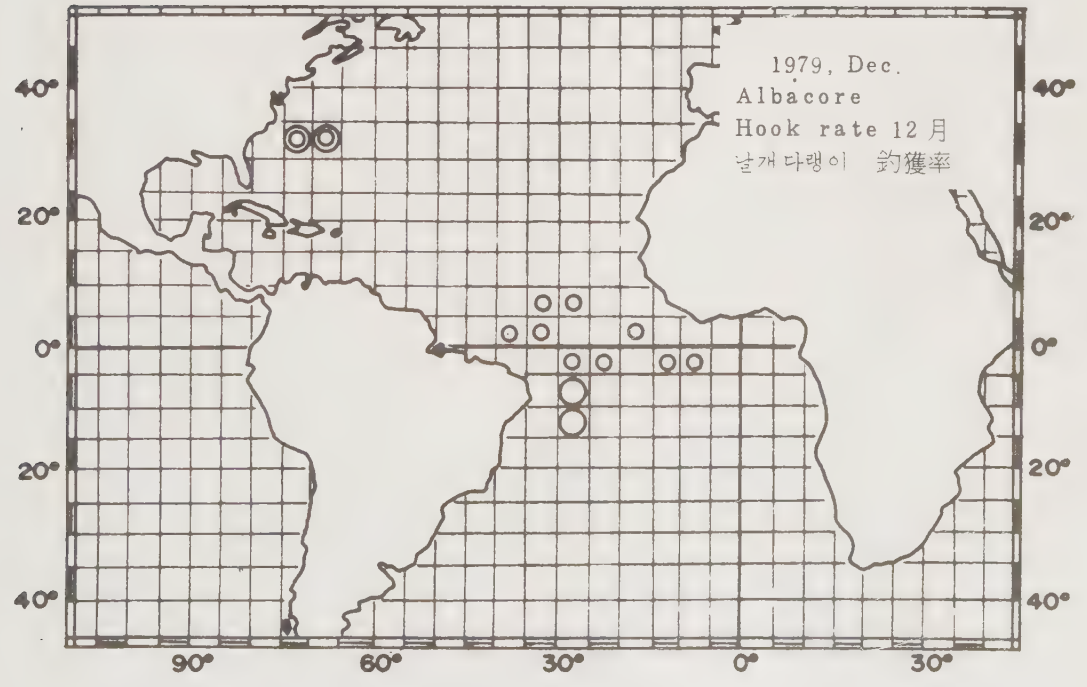

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. Jul.
Albacore
Hook rate 7月
날개다랑이 釣獲率


1979. Aug.
Albacore
Hook rate 8月
날개다랑이 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°


90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Sep.
Albacore
Hook rate 9月
날개다랑이 釣獲率

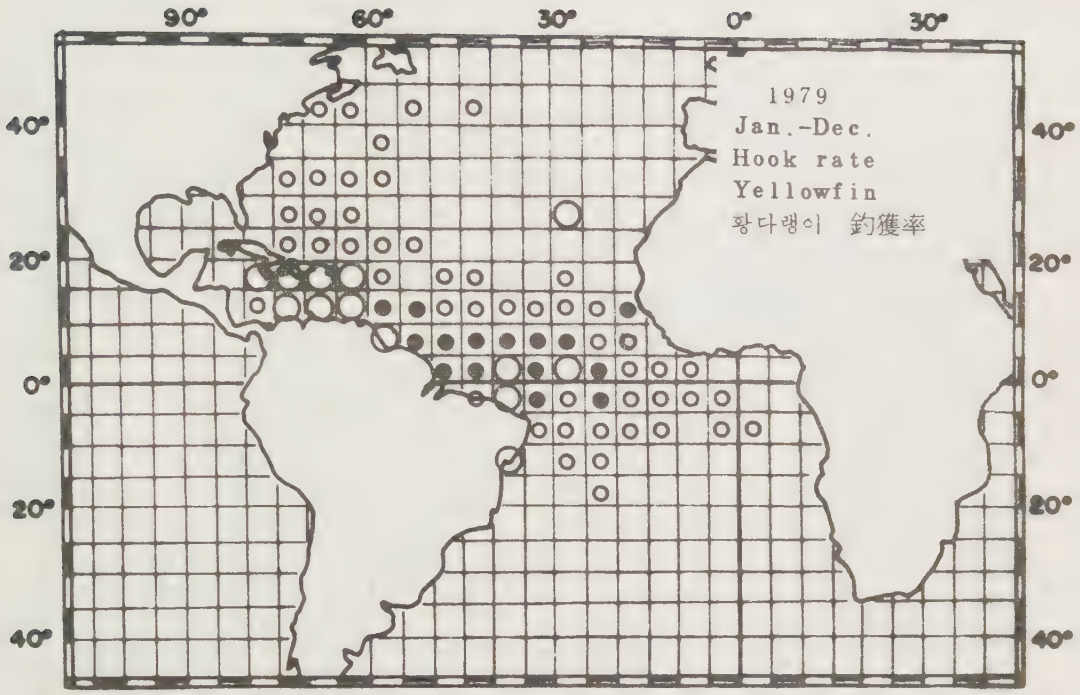

40°
20°
0°
20°
40°
1979, Oct.
Albacore
Hook rate 10月
날개다랑이 釣獲率
90°
60°
30°
0°
30°

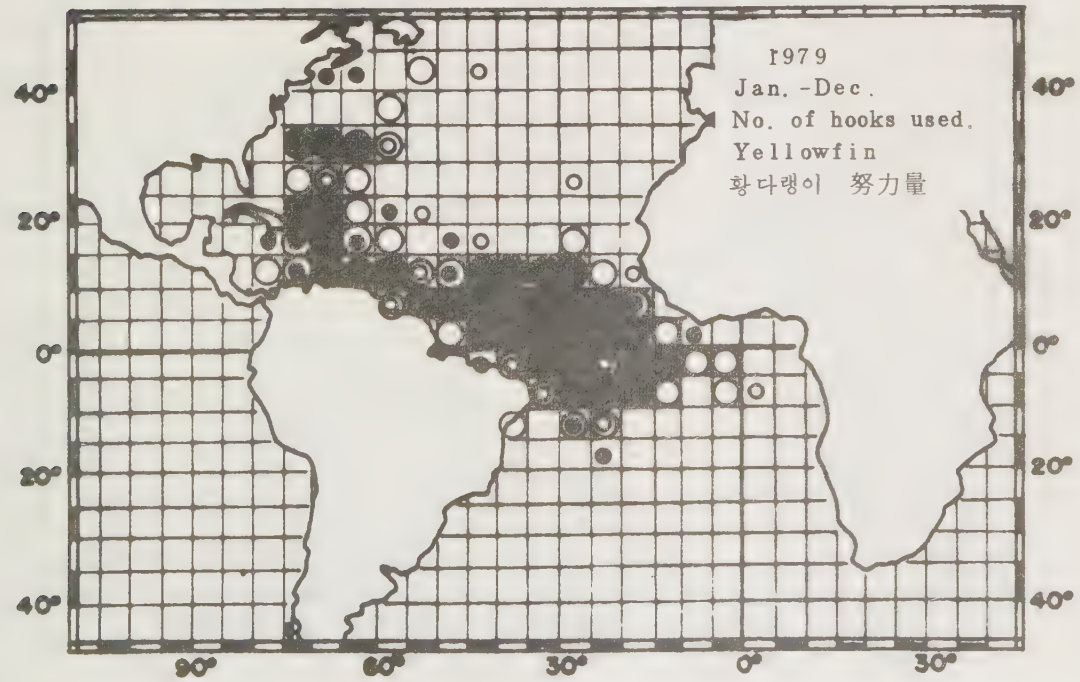

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Nov.
Albacore
Hook rate 11月
날개다랑이 釣獲率

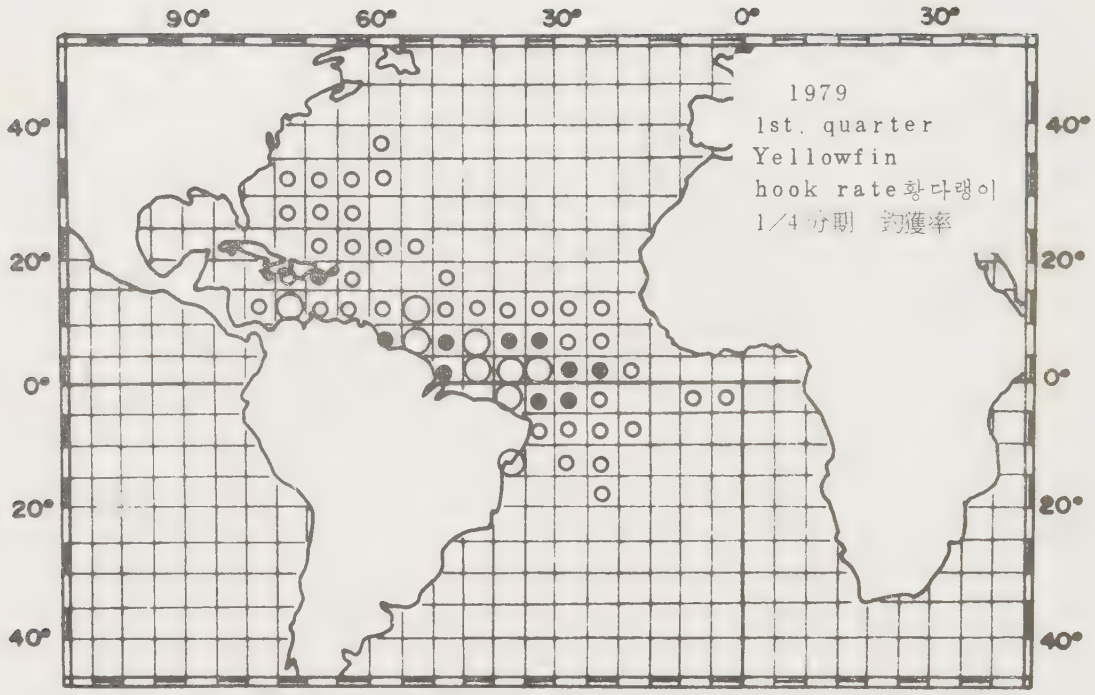

40°
20°
0°
20°
40°
1979, Dec.
Albacore
Hook rate 12月
날개다랑이 釣獲率
90°
60°
30°
0°
30°

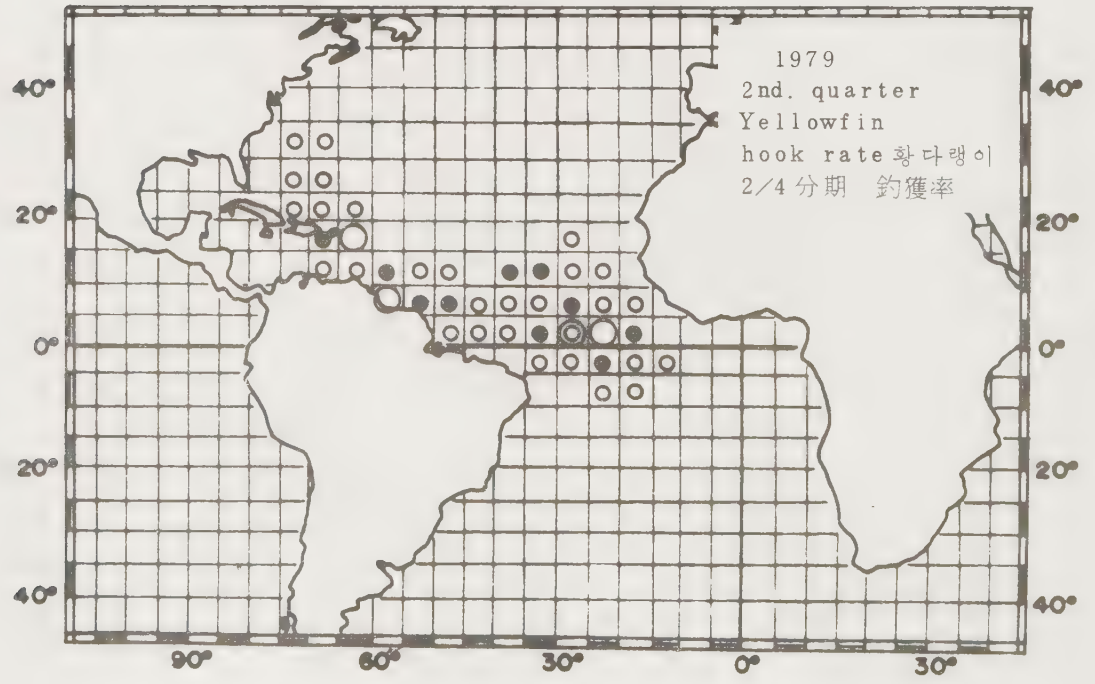
황 다 랭 이

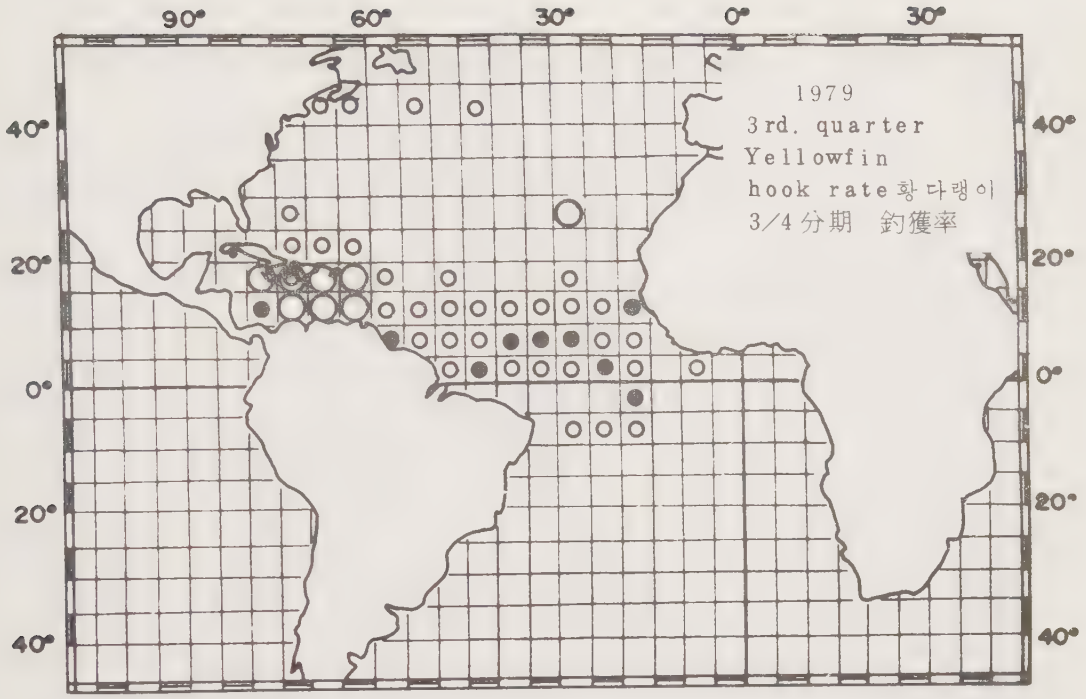
Yellowfin

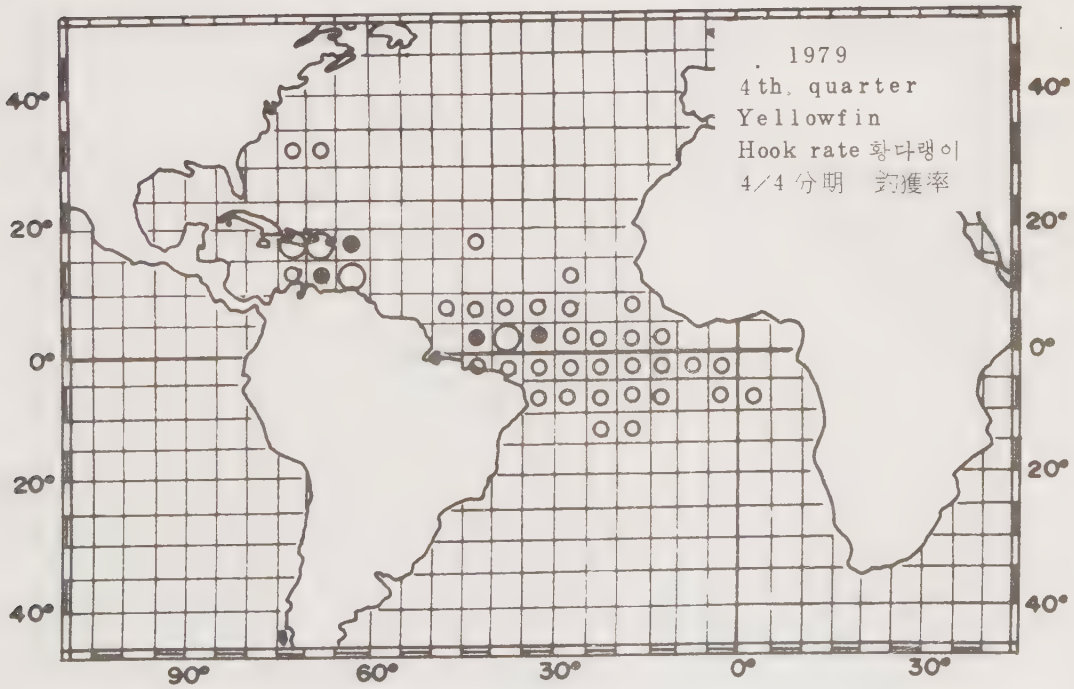

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
Jan.-Dec.
Hook rate
Yellowfin
황다랭이 釣獲率

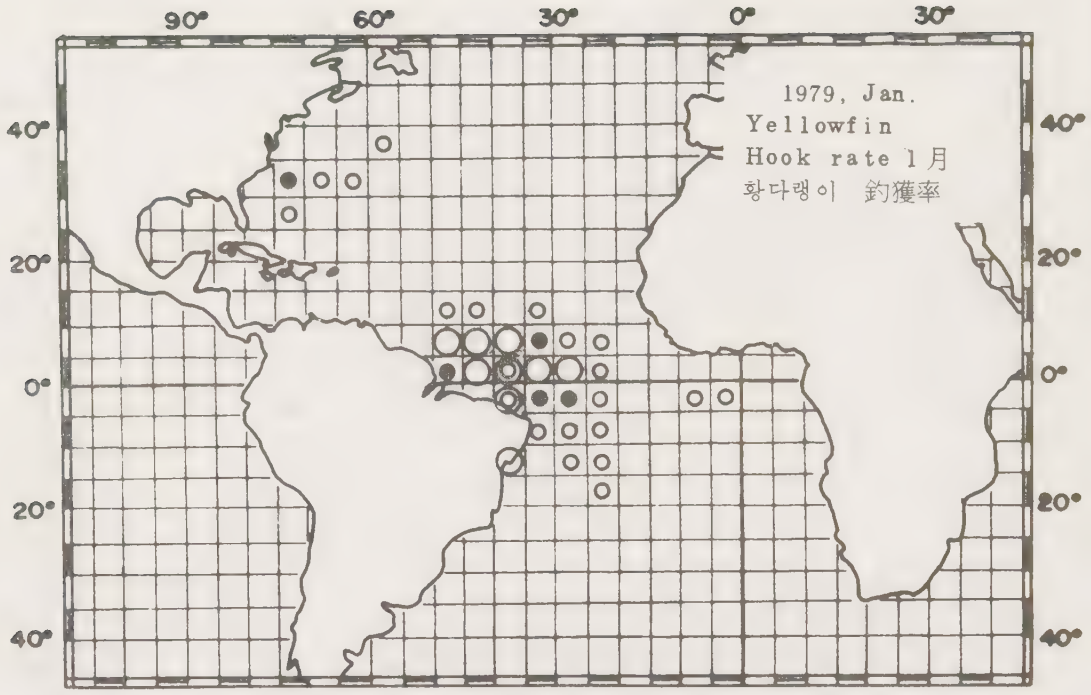

1979
Jan.-Dec.
No. of hooks used.
Yellowfin
황다랭이 努力量
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

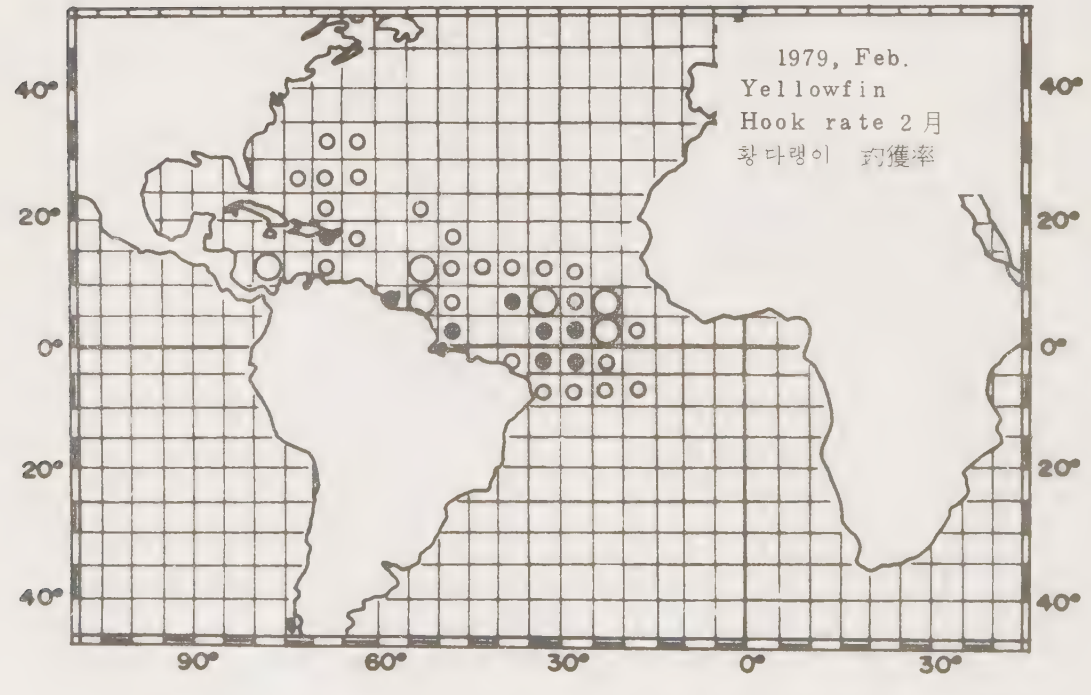

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
1st. quarter
Yellowfin
hook rate황다랑이
1/4 分期 釣獲率

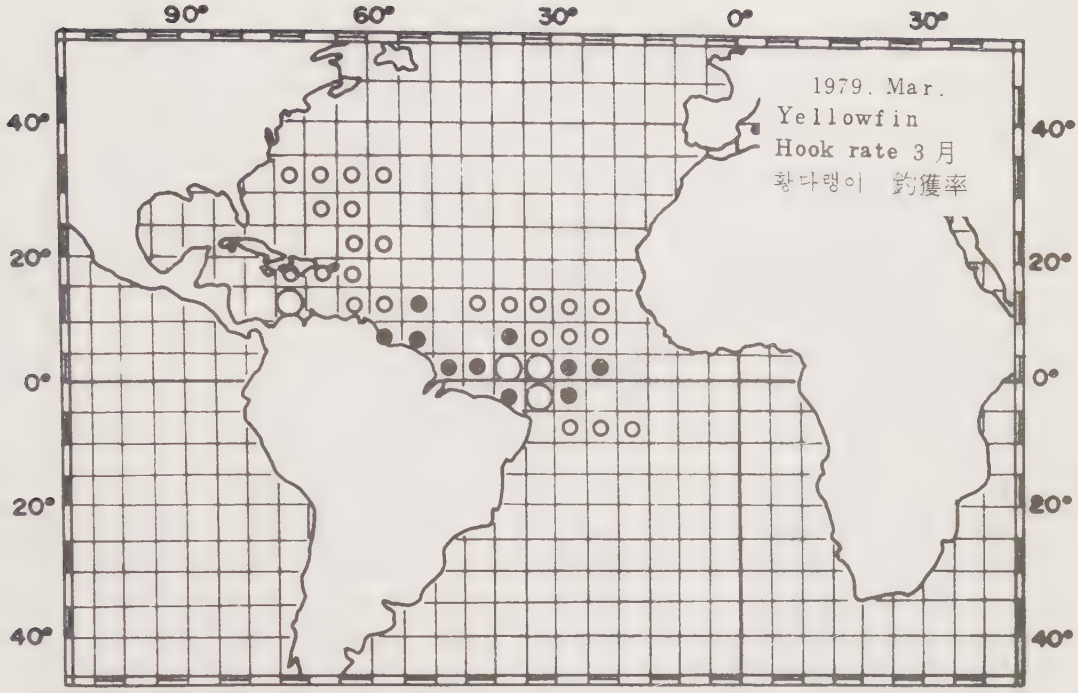

1979
2nd. quarter
Yellowfin
hook rate황다랑이
2/4 分期 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

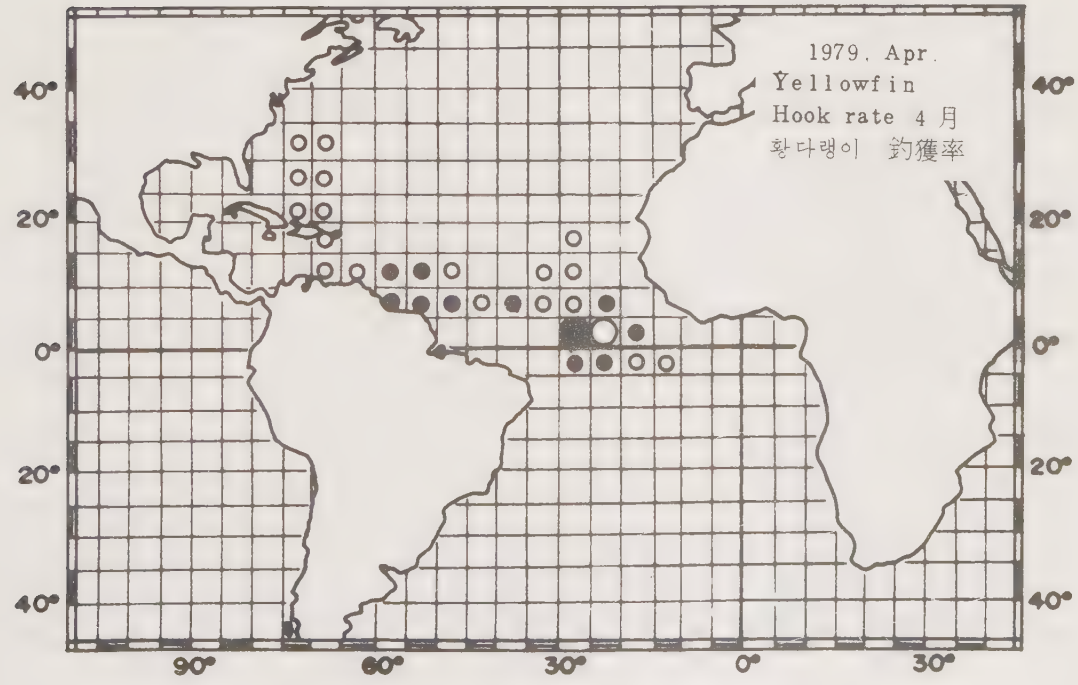

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
3rd. quarter
Yellowfin
hook rate 황다랑이
3/4 分期 釣獲率

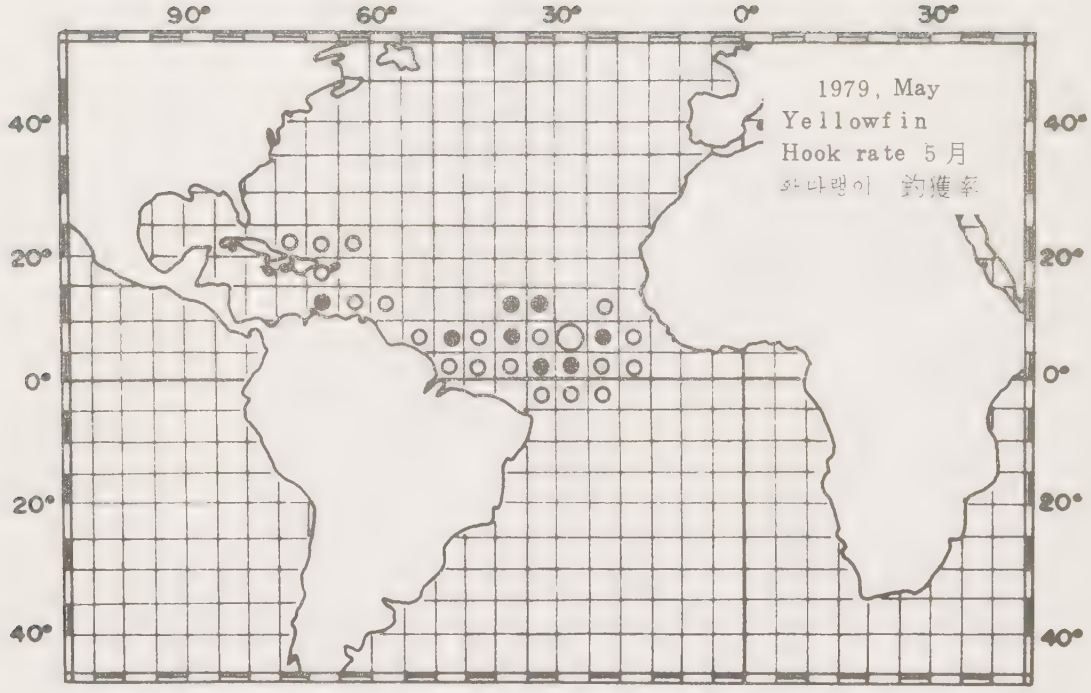

1979
4th. quarter
Yellowfin
Hook rate 황다랑이
4/4 分期 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

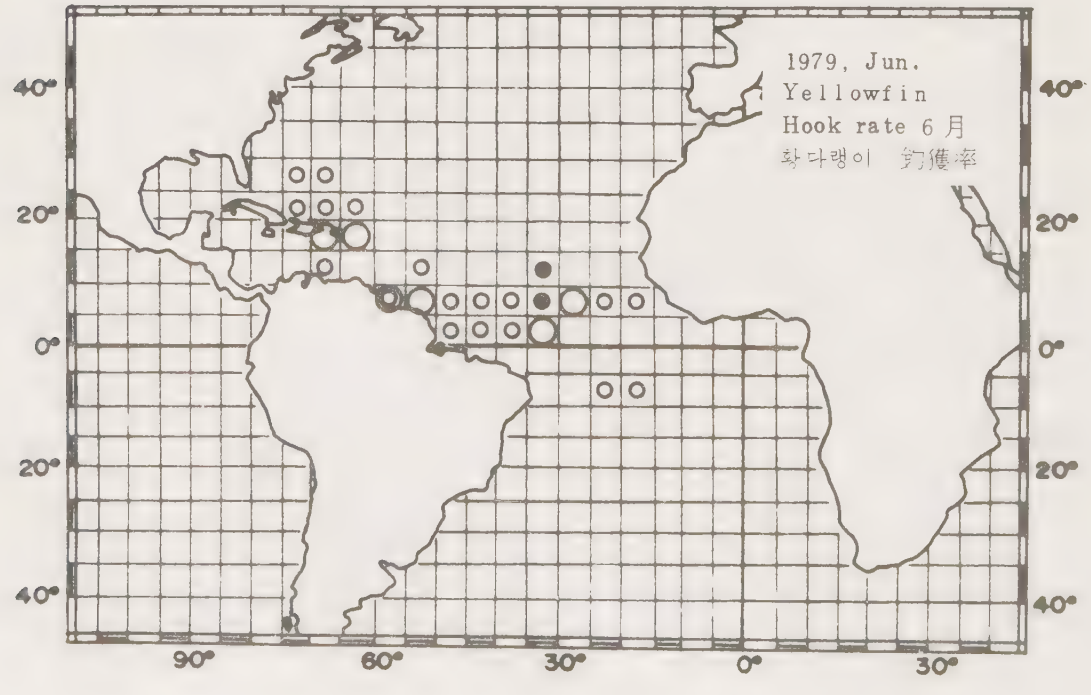

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Jan.
Yellowfin
Hook rate 1月
황다랑이 釣獲率

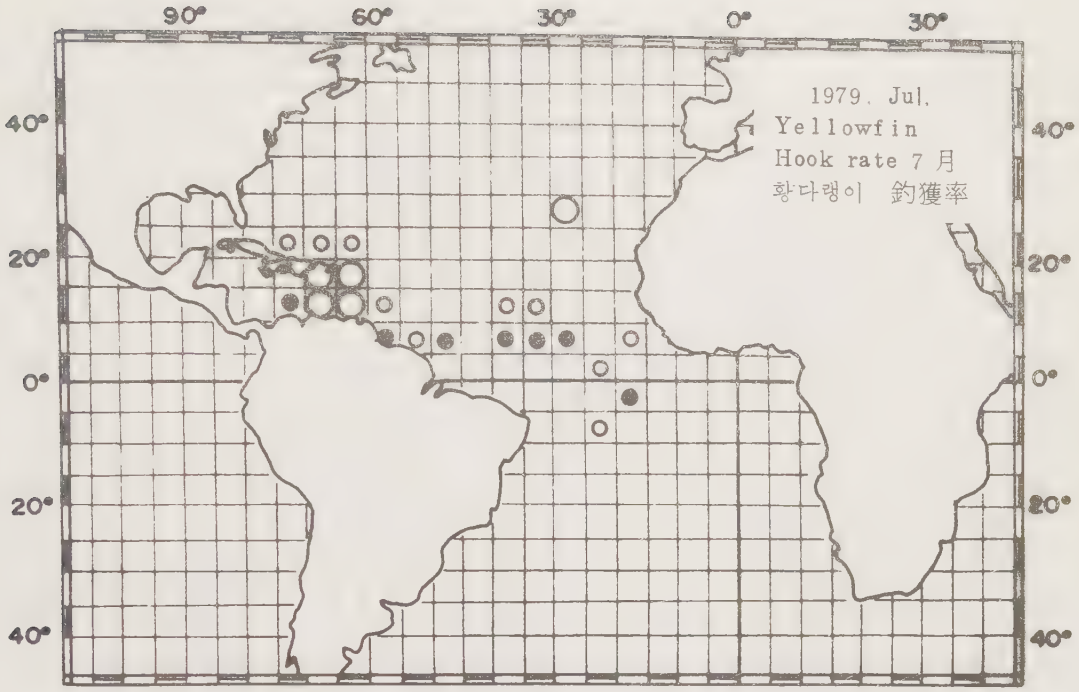

40°
20°
0°
20°
40°
1979, Feb.
Yellowfin
Hook rate 2月
황다랑이 釣獲率
90°
60°
30°
0°
30°

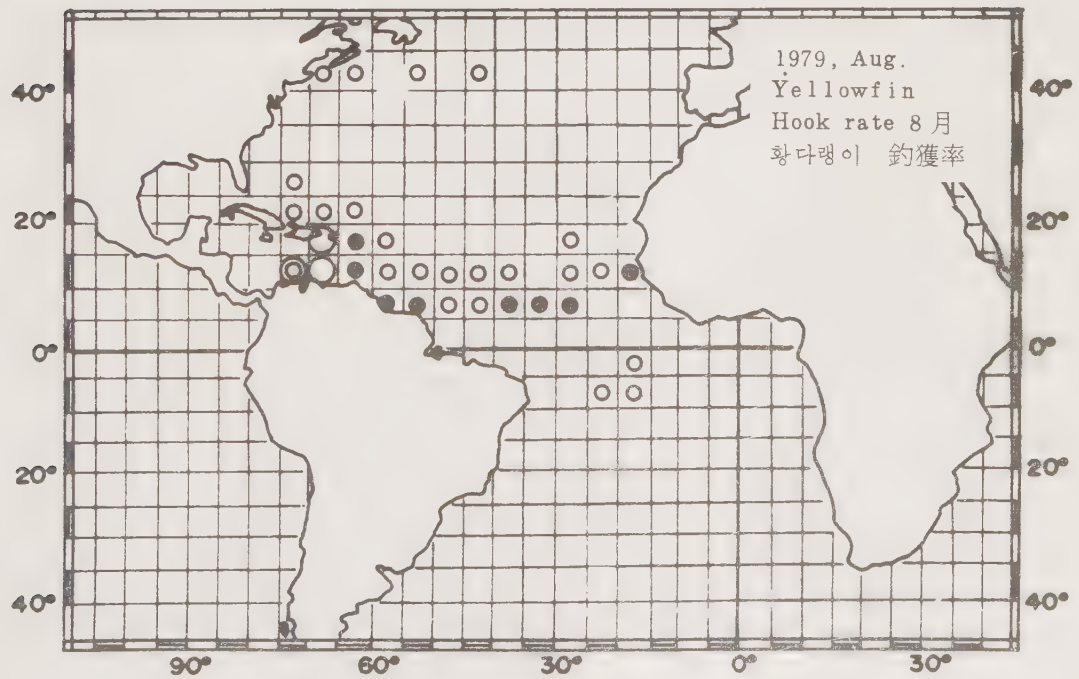

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. Mar.
Yellowfin
Hook rate 3 月
황다랭이 釣獲率

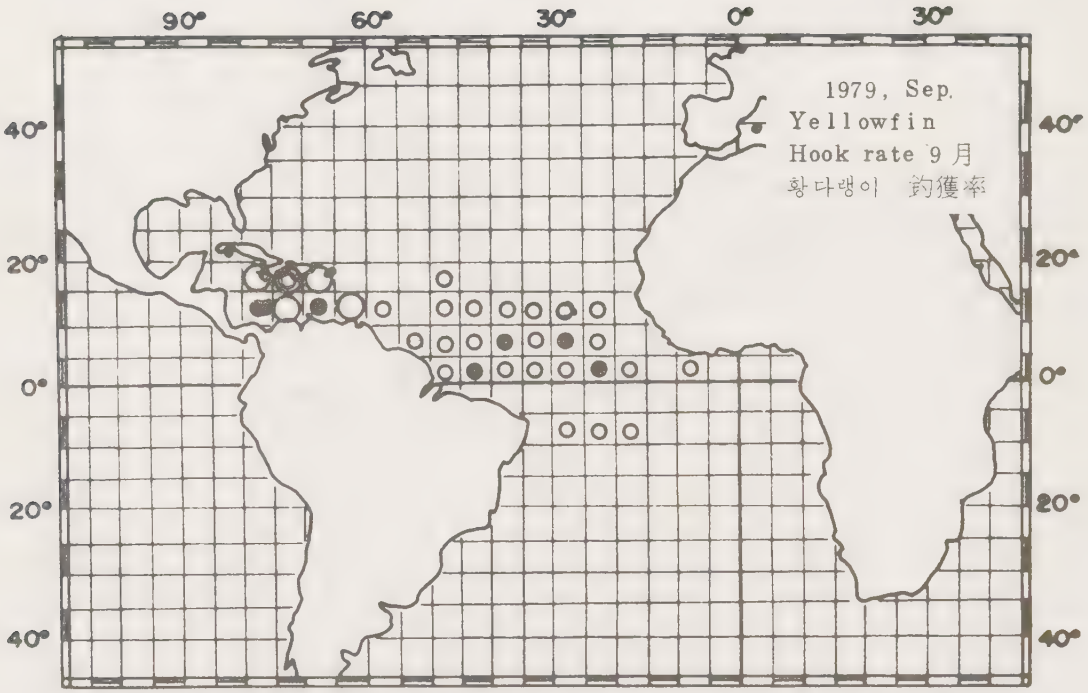

40°
20°
0°
20°
40°
1979. Apr.
Yellowfin
Hook rate 4 月
황다랭이 釣獲率
90°
60°
30°
0°
30°

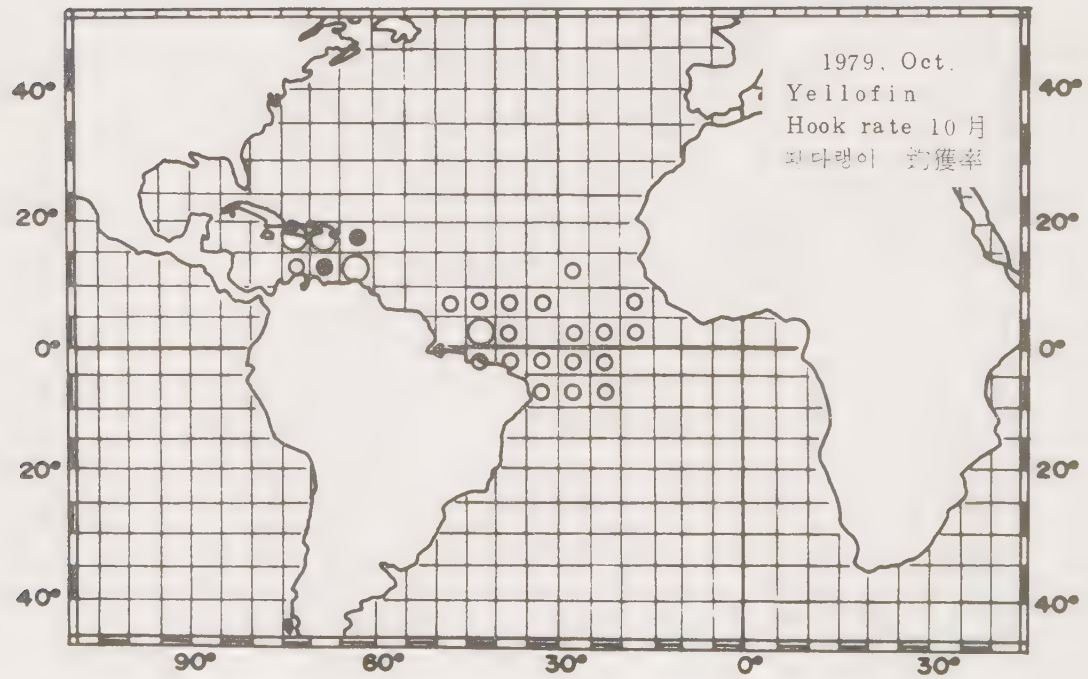

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, May
Yellowfin
Hook rate 5月
황다랑이 釣獲率

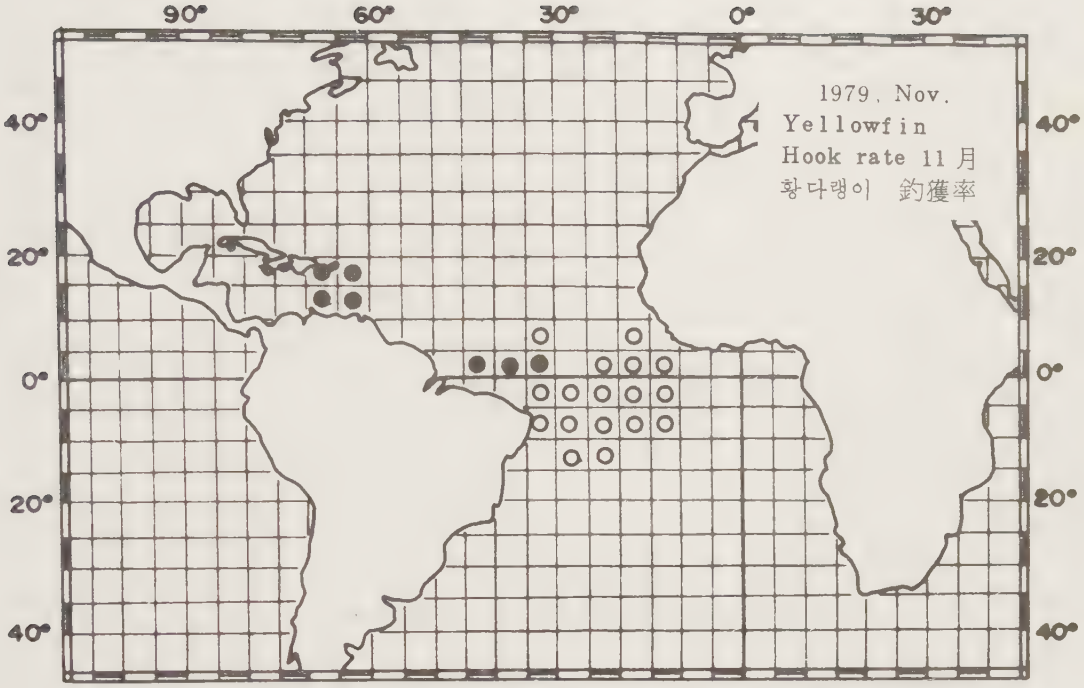

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Jun.
Yellowfin
Hook rate 6月
황다랑이 釣獲率

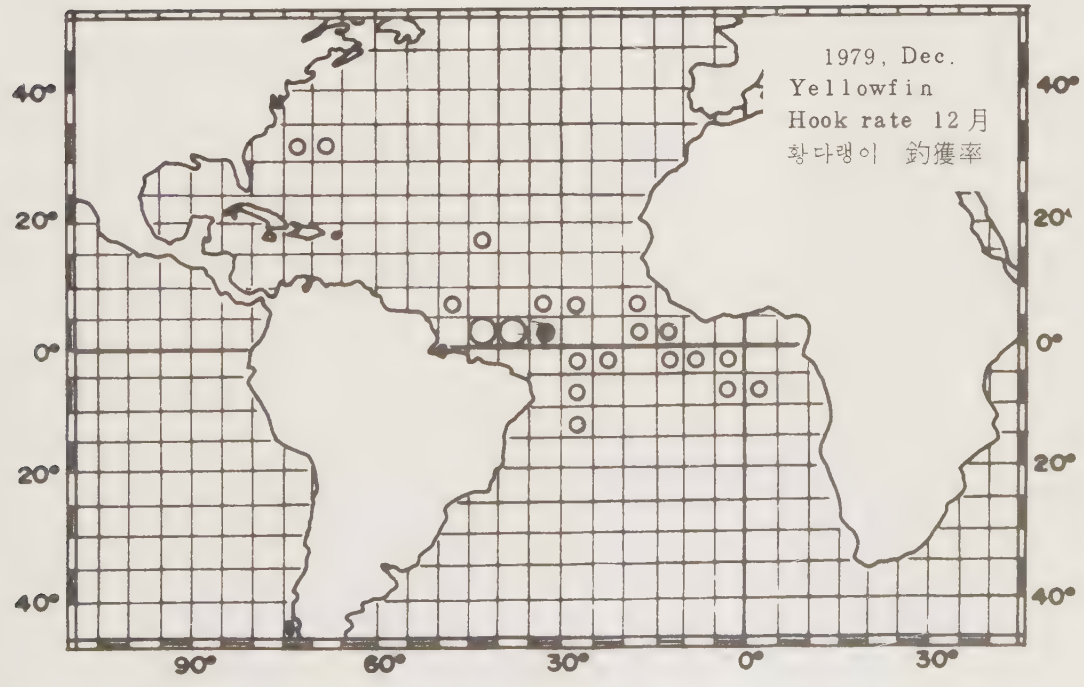

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. Jul.
Yellowfin
Hook rate 7 月
황다랭이 釣獲率


1979, Aug.
Yellowfin
Hook rate 8 月
황다랭이 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°


90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Sep.
Yellowfin
Hook rate 9月
황다랑이 釣獲率

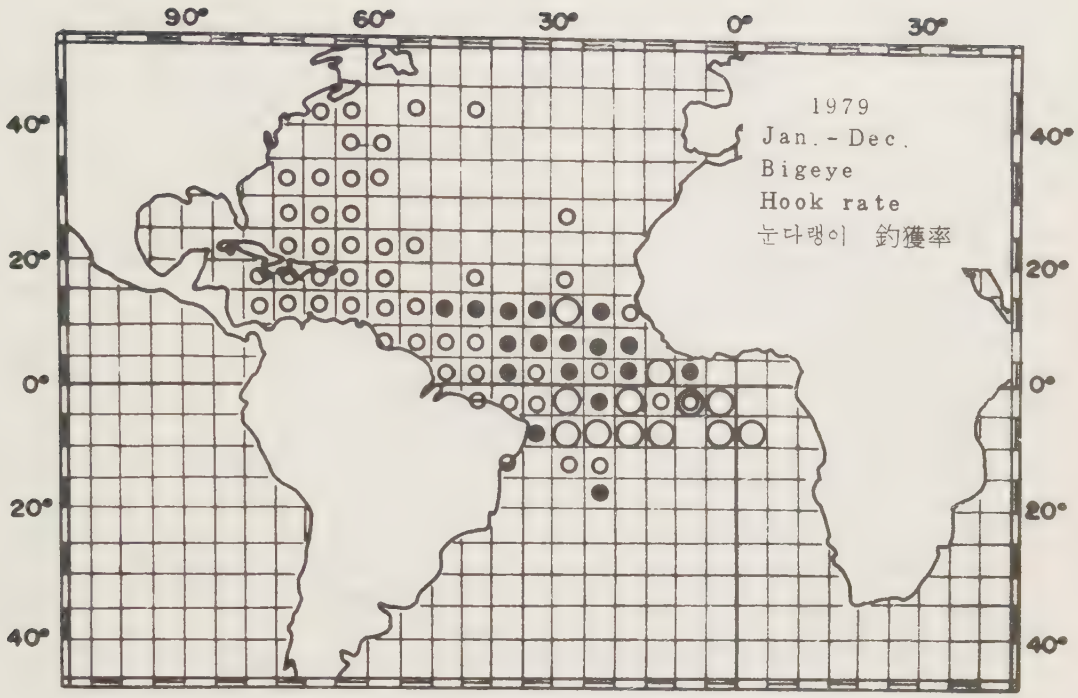

40°
20°
0°
20°
40°
1979. Oct.
Yellofin
Hook rate 10月
황다랑이 釣獲率
90°
60°
30°
0°
30°

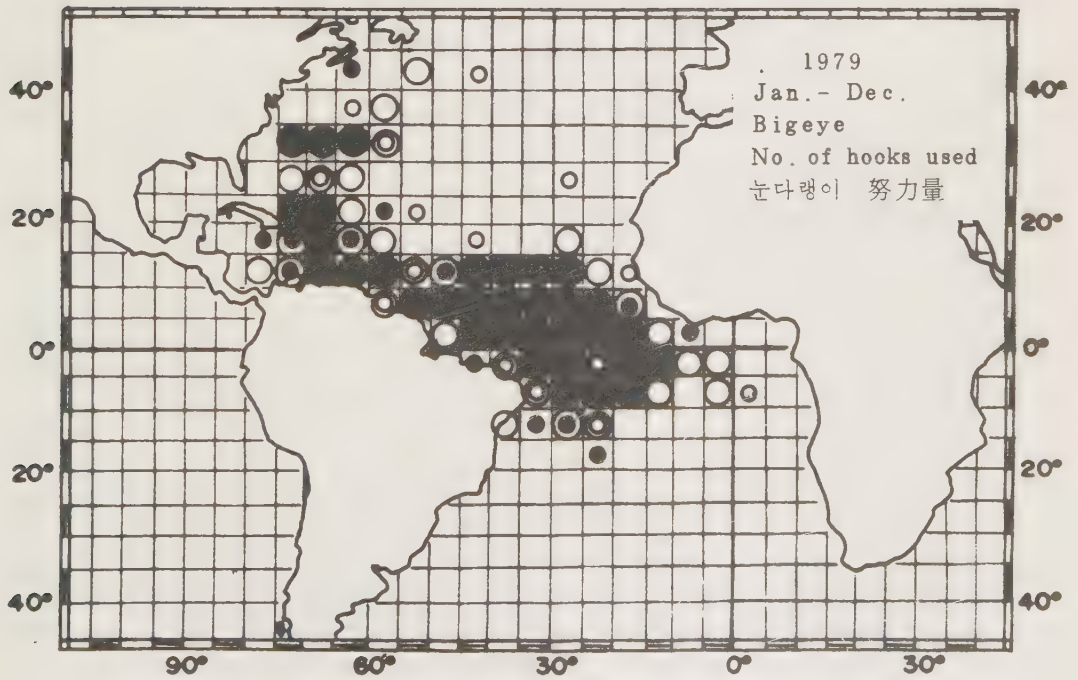

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Nov.
Yellowfin
Hook rate 11月
황다랑이 釣獲率

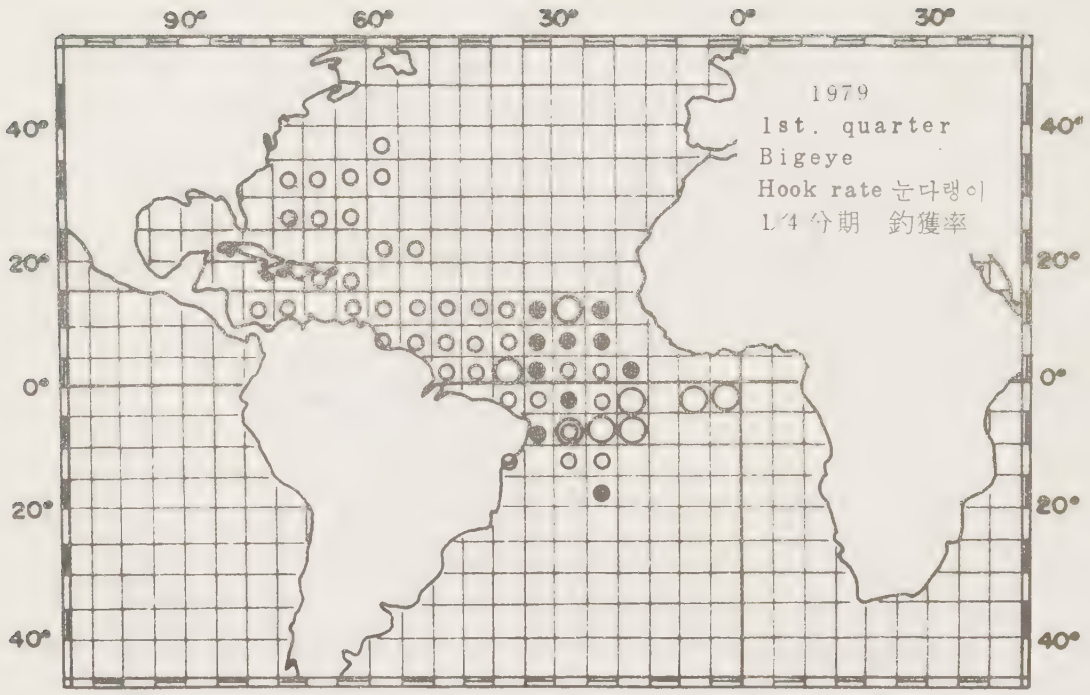

40°
20°
0°
20°
40°
1979, Dec.
Yellowfin
Hook rate 12月
황다랑이 釣獲率
90°
60°
30°
0°
30°

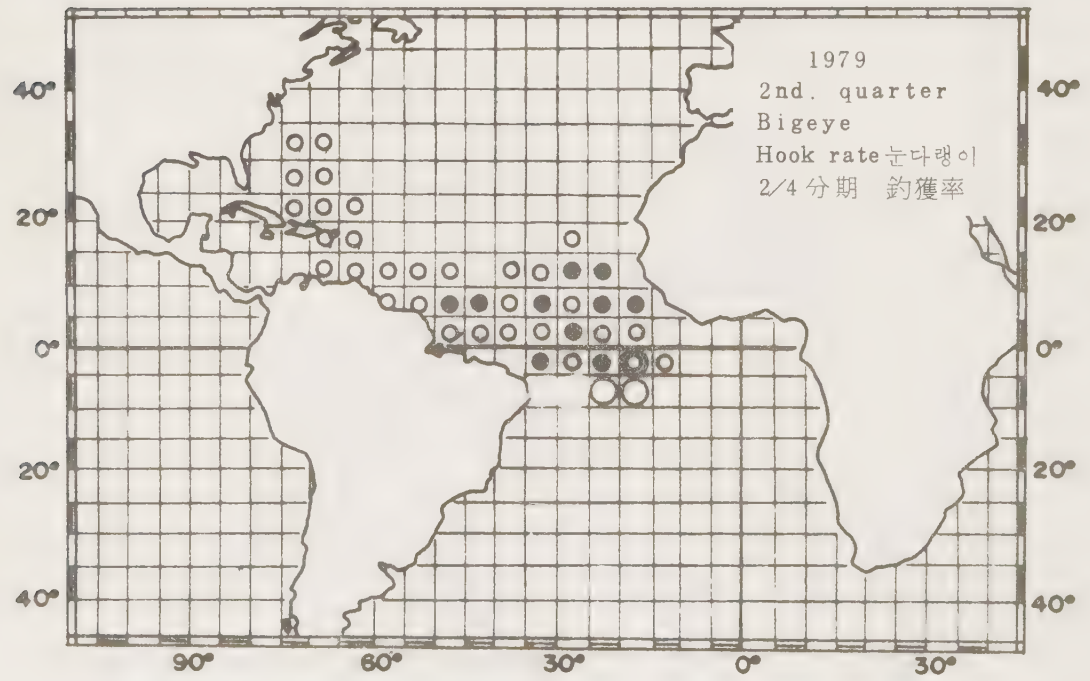
눈 다 랭 이

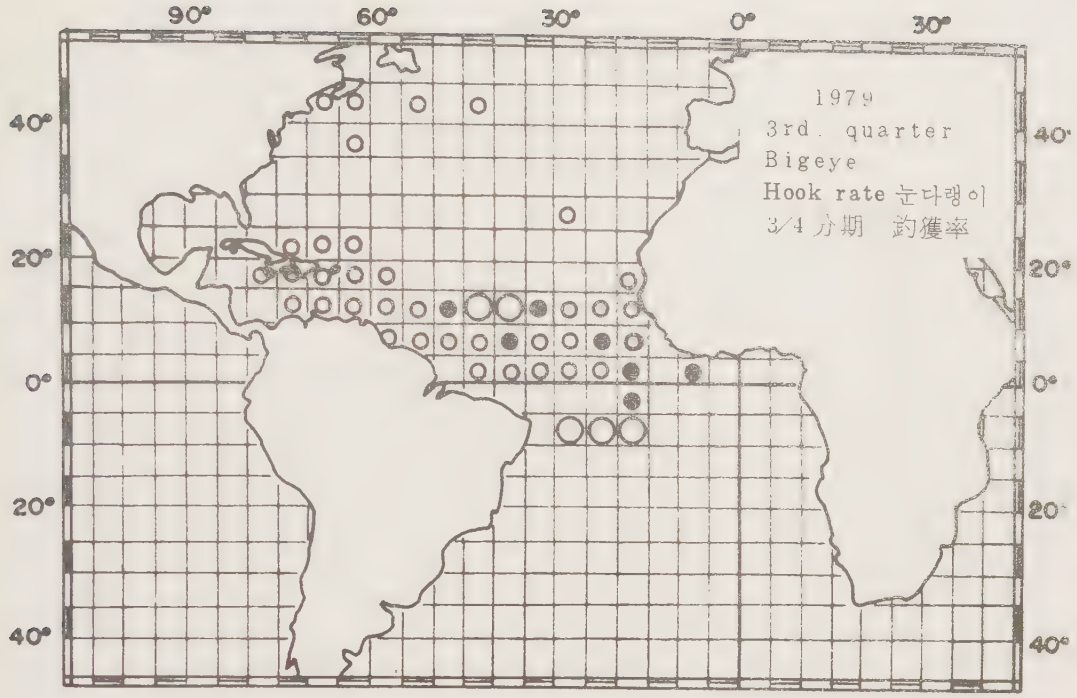
Bigeye

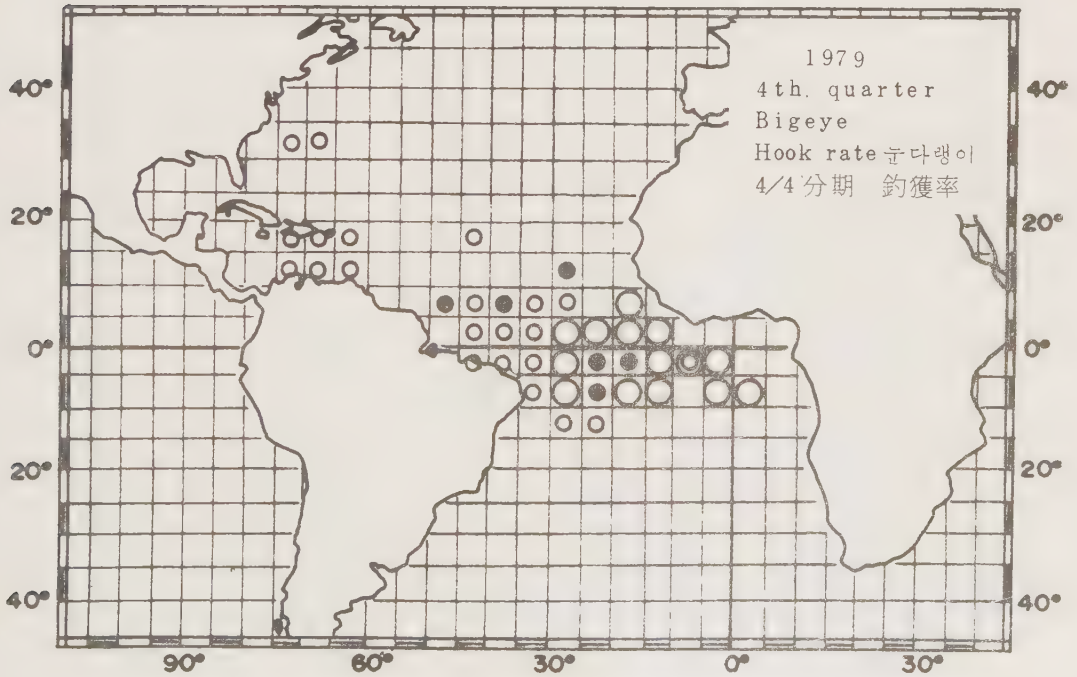

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
Jan. - Dec.
Bigeye
Hook rate
눈다랑이 釣獲率

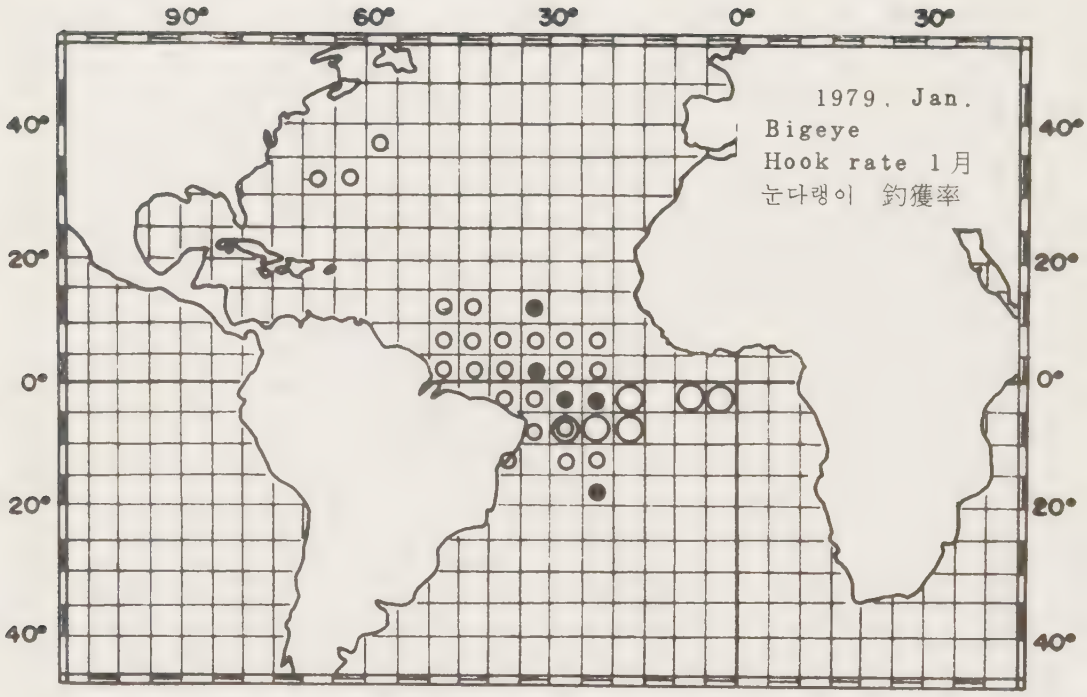

1979
Jan. - Dec.
Bigeye
No. of hooks used
눈다랑이 努力量
90°
60°
30°
0°
30°
40°
20°
0°
20°

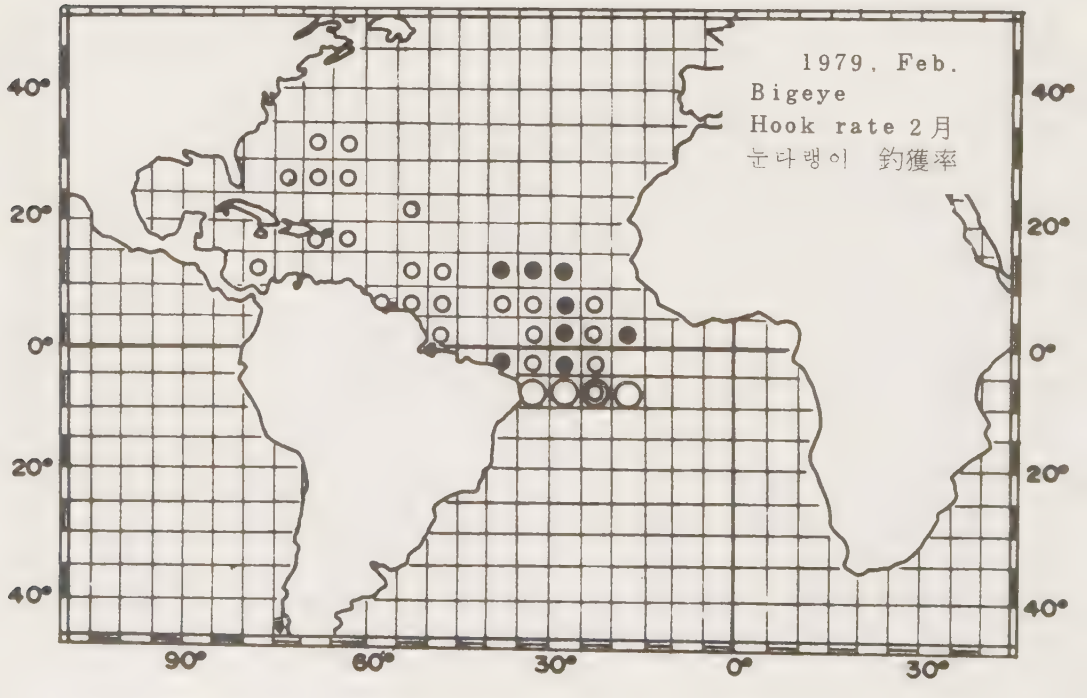

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
1st. quarter
Bigeye
Hook rate 눈다랑이
1/4 分期 釣獲率

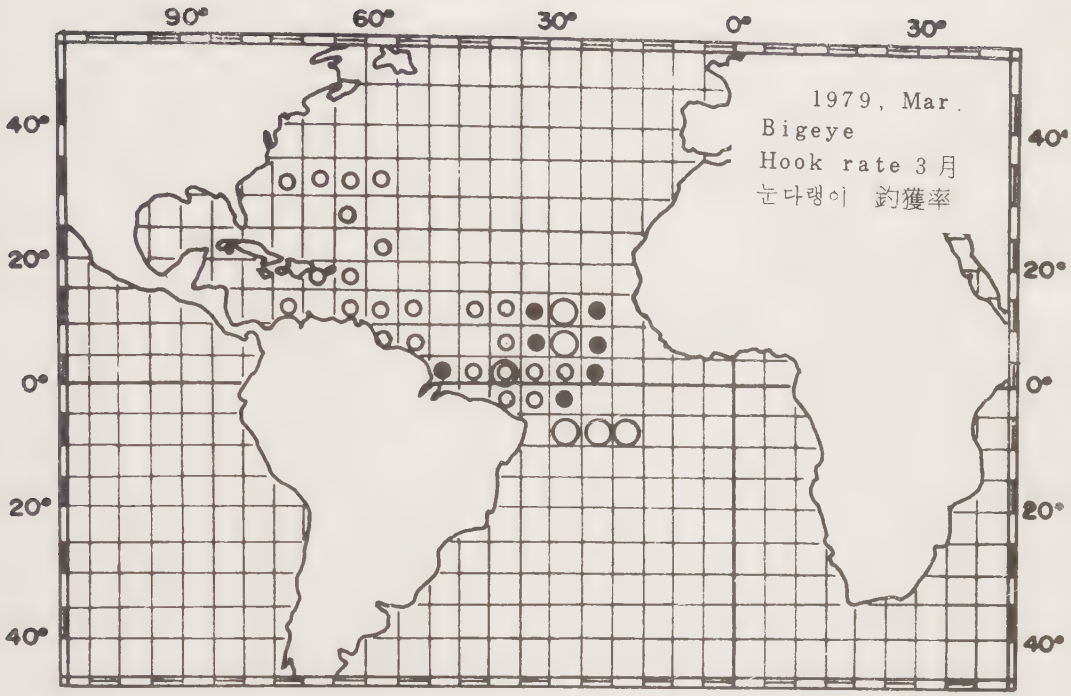

1979
2nd. quarter
Bigeye
Hook rate 눈다랑이
2/4 分期 釣獲率
90°
60°
30°
0°
30°
40°
20°
0°
20°
40°

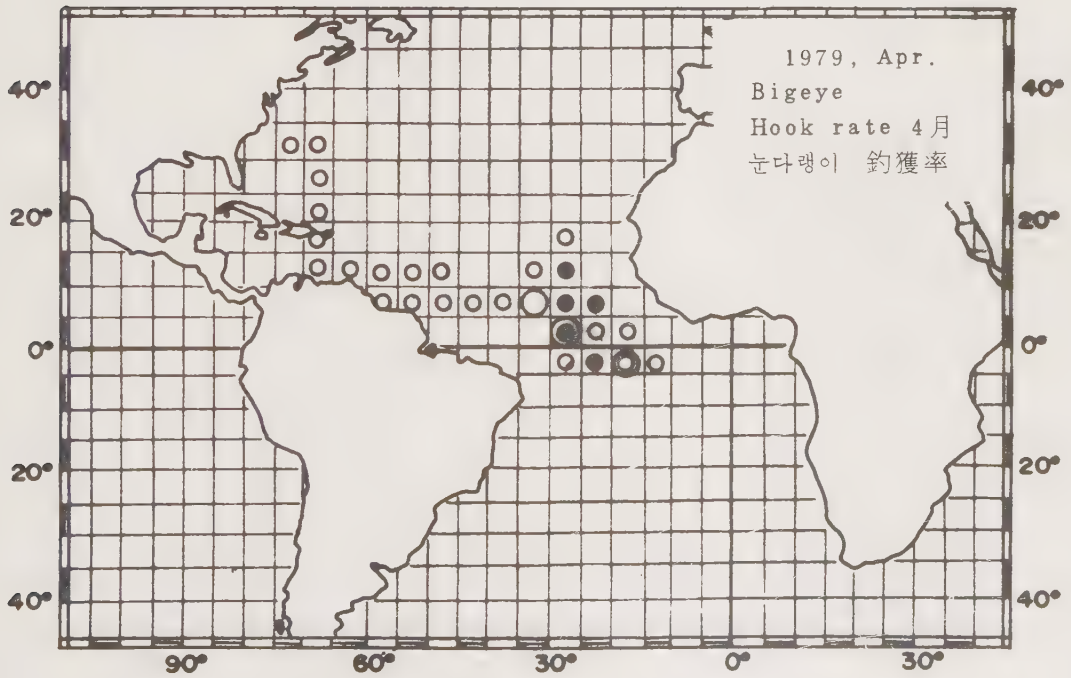

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979
3rd. quarter
Bigeye
Hook rate 눈다랑이
3/4 分期 釣獲率

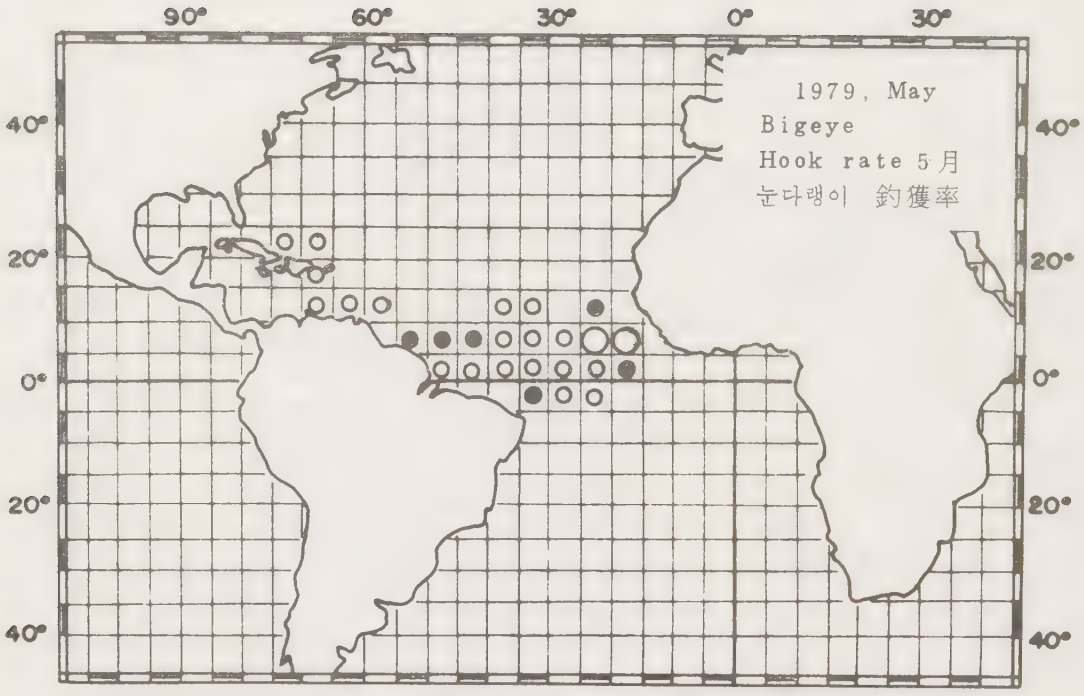

1979
4th. quarter
Bigeye
Hook rate 눈다랑이
4/4 分期 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

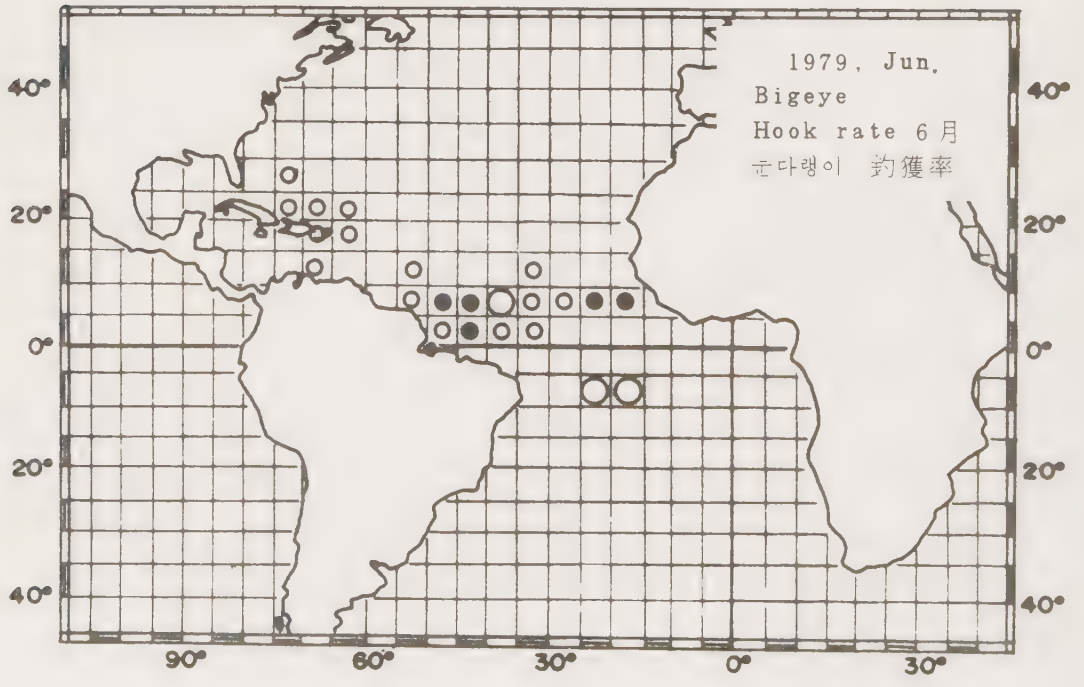

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979. Jan.
Bigeye
Hook rate 1月
눈다랑이 釣獲率

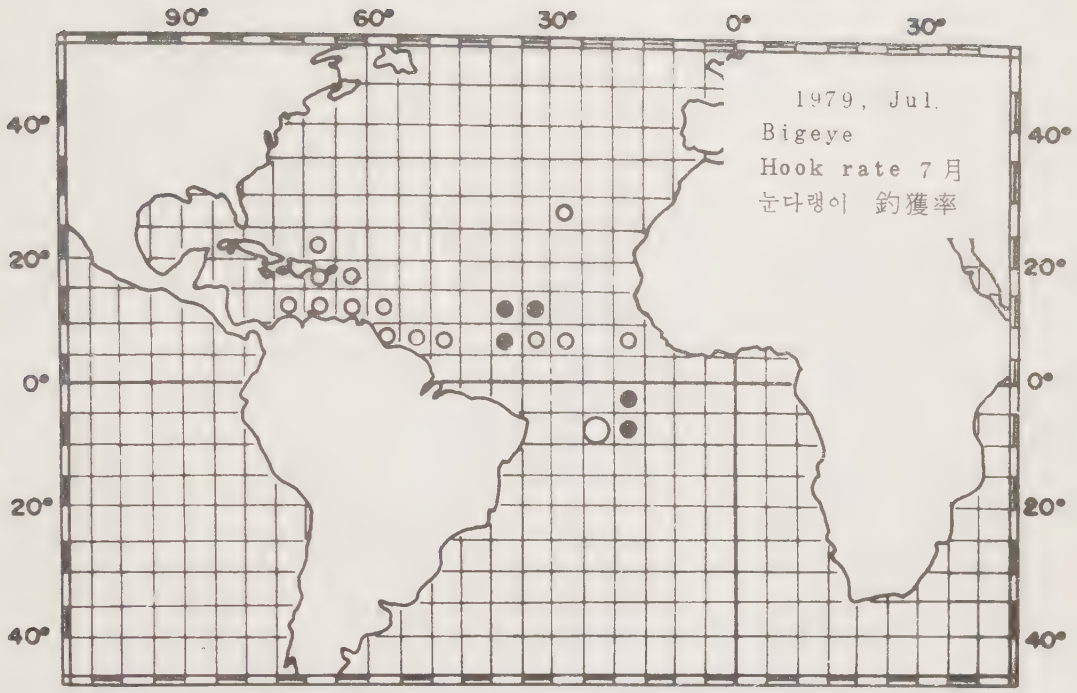

1979. Feb.
Bigeye
Hook rate 2月
눈다랑이 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

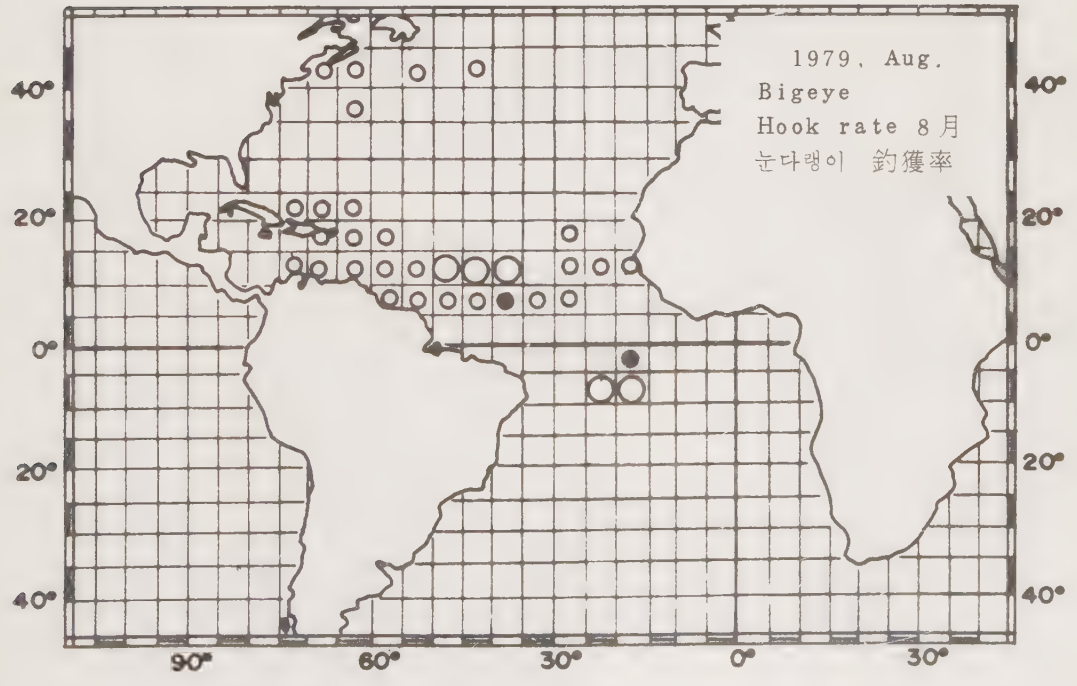

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Mar.
Bigeye
Hook rate 3月
눈다랑이 釣獲率

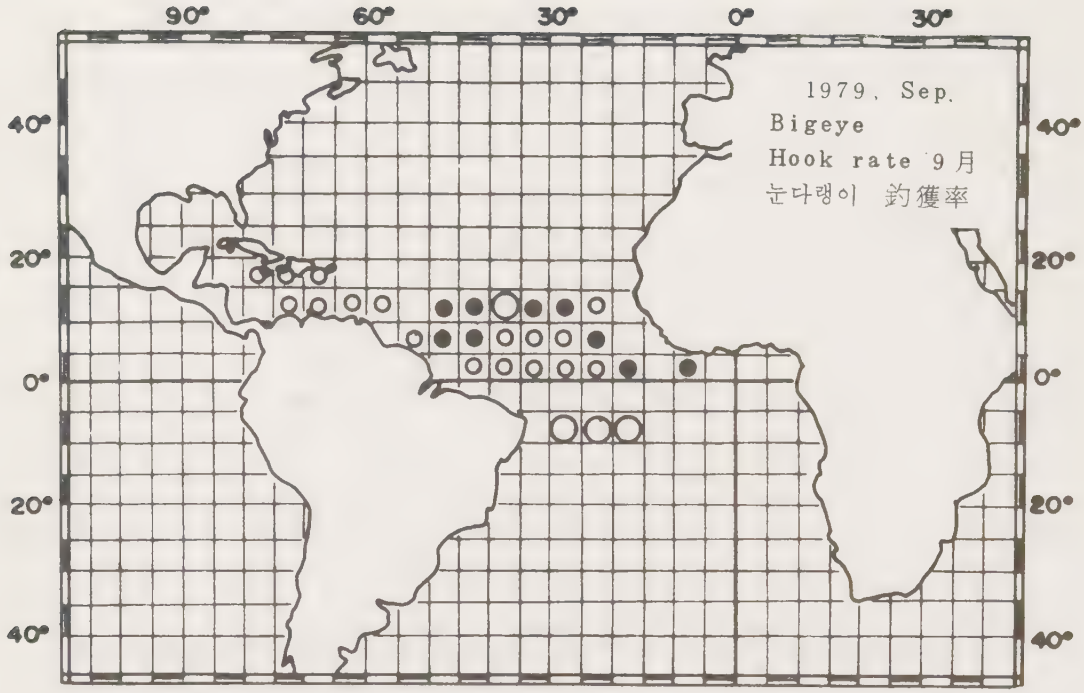

1979, Apr.
Bigeye
Hook rate 4月
눈다랑이 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

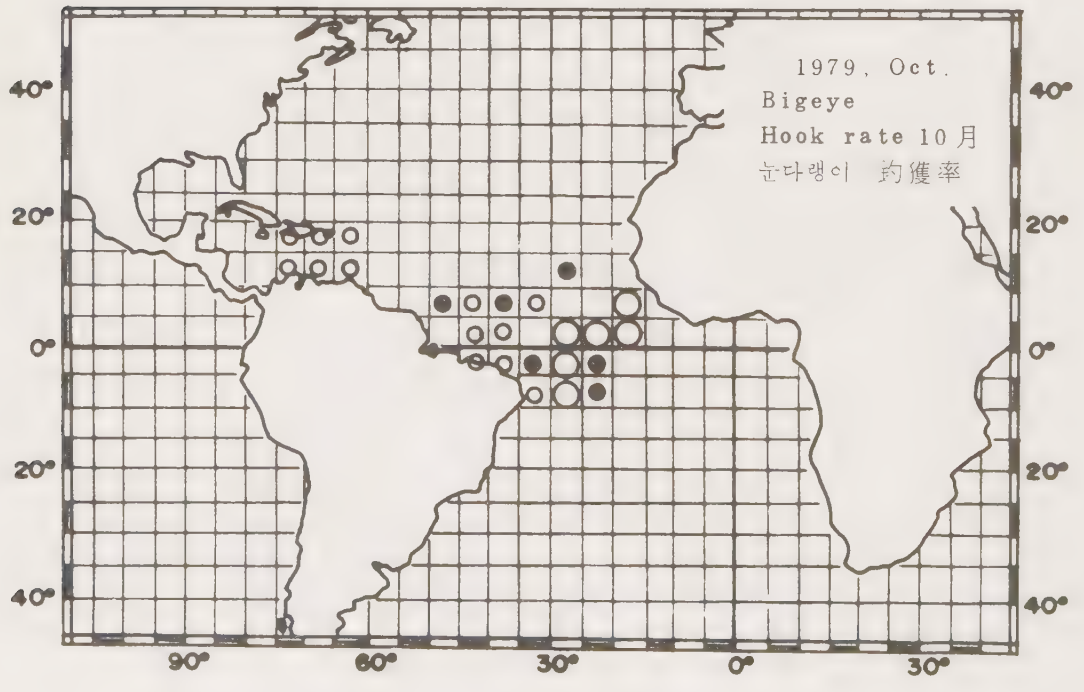

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, May
Bigeye
Hook rate 5月
눈다랑이 釣獲率

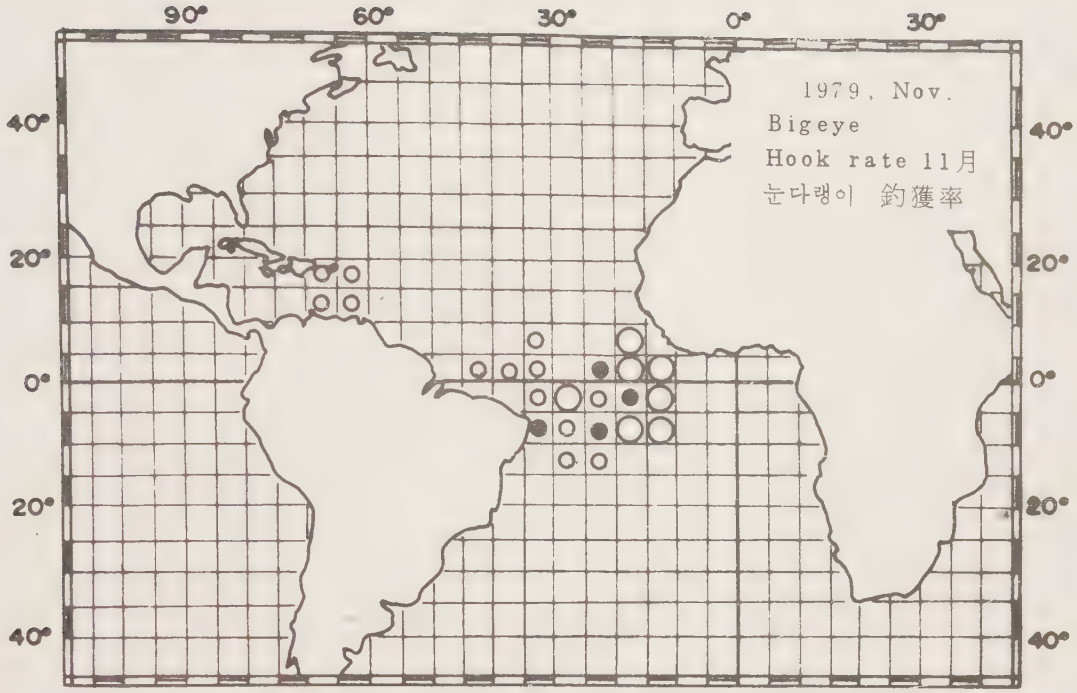

1979, Jun.
Bigeye
Hook rate 6月
눈다랑이 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

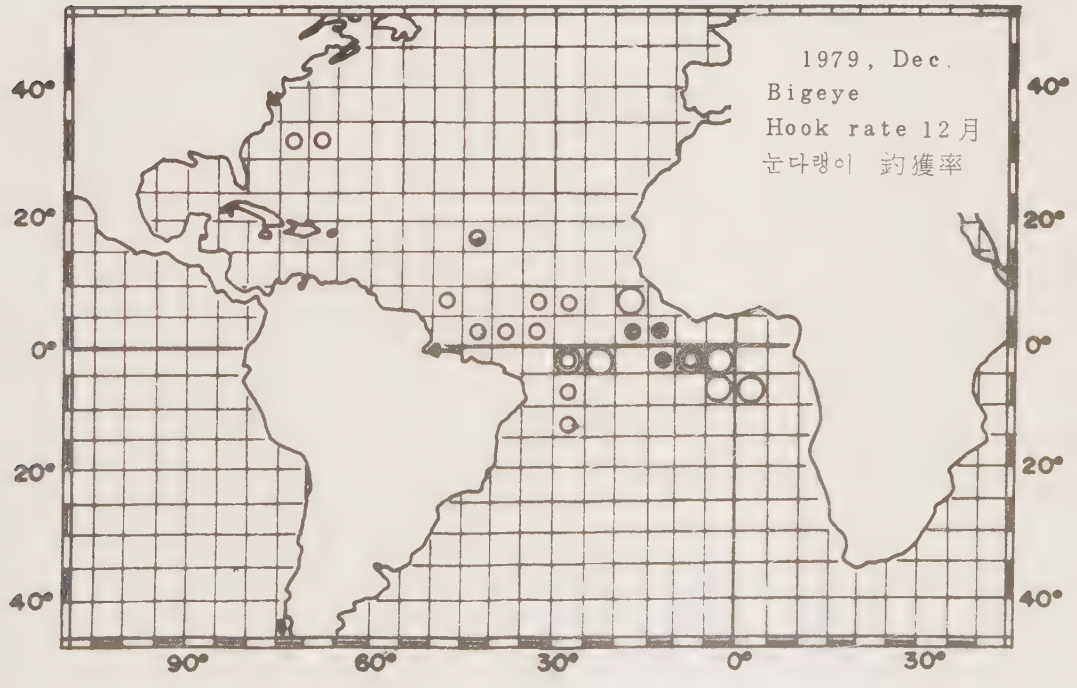

90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Jul.
Bigeye
Hook rate 7月
눈다랑이 釣獲率


1979, Aug.
Bigeye
Hook rate 8月
눈다랑이 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°


90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Sep.
Bigeye
Hook rate 9月
눈다랑이 釣獲率


40°
20°
0°
20°
40°
1979, Oct.
Bigeye
Hook rate 10月
눈다랑이 釣獲率
90°
60°
30°
0°
30°


90°
60°
30°
0°
30°
40°
20°
0°
20°
40°
1979, Nov.
Bigeye
Hook rate 11月
눈다랑이 釣獲率


1979, Dec.
Bigeye
Hook rate 12月
눈다랑이 釣獲率
40°
20°
0°
20°
40°
90°
60°
30°
0°
30°

印　　度　　洋
Indian Ocean

1. 全魚種의 分期別 月別 釣獲率 및 努力量 分布図

Distribution of hook rate and fishing effort of all species by month and by quarter

2. 魚種別 分期別 月別 釣獲率 및 努力量 分布図
날개다랑이, 황다랑이, 눈다랑이

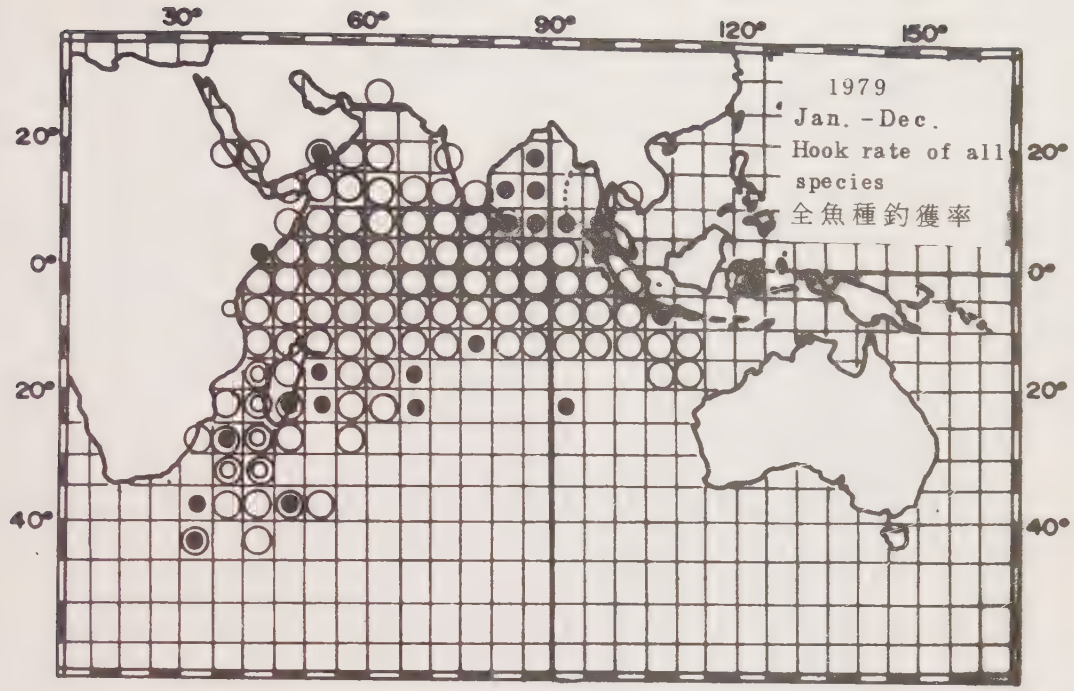
Distribution of hook rate and fishing effort by species by month and by quarter
Albacore, Yellowfin, Bigeye

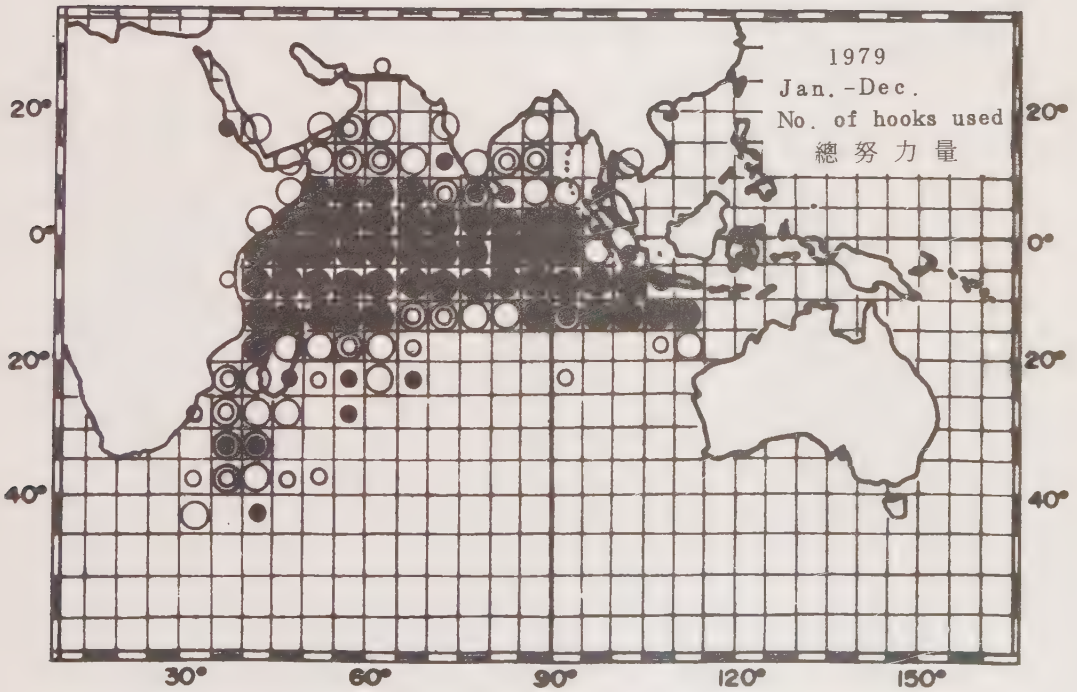
全　　魚　　種

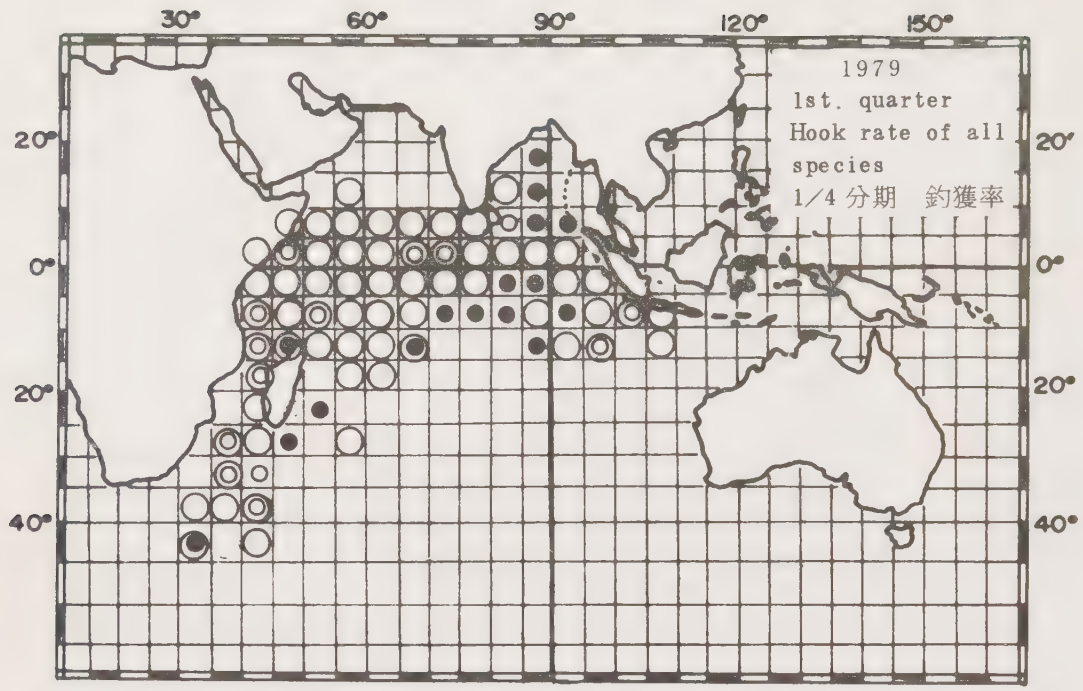
分期別 月別 釣獲率 및 漁獲努力 分布圖

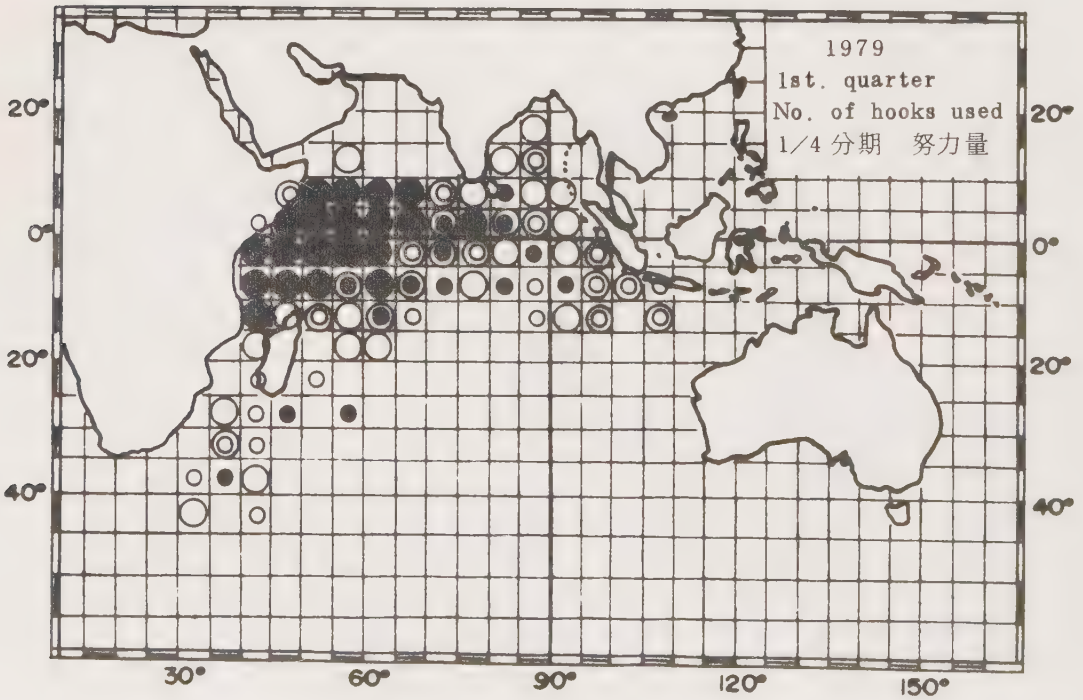
All species

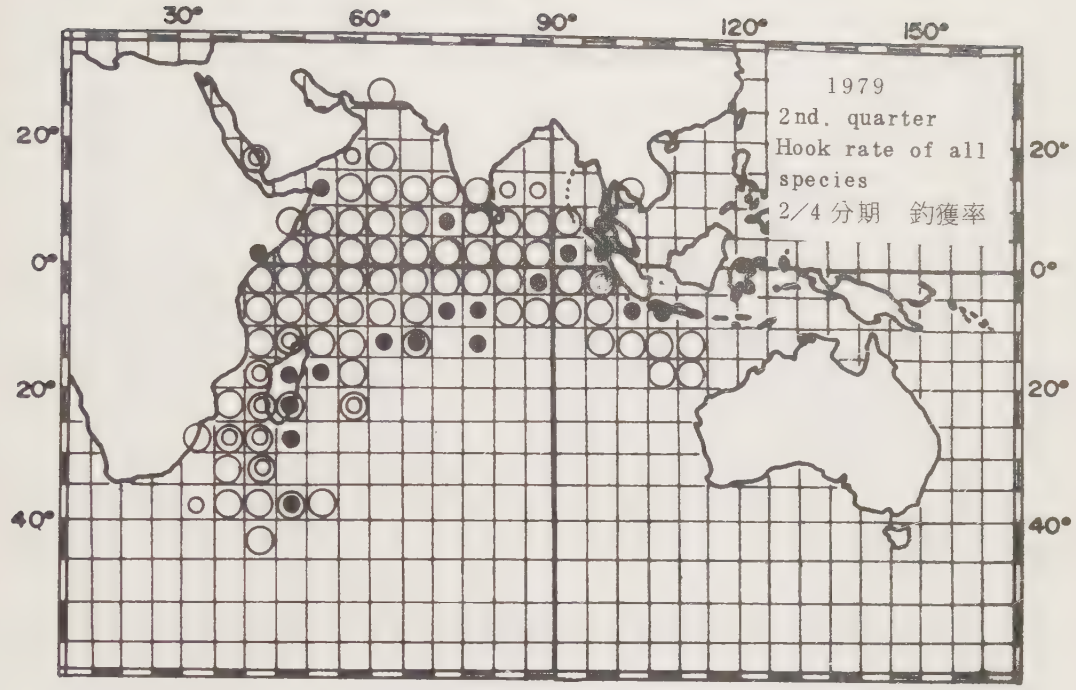
Hook rate and fishing effort by month and by quarter

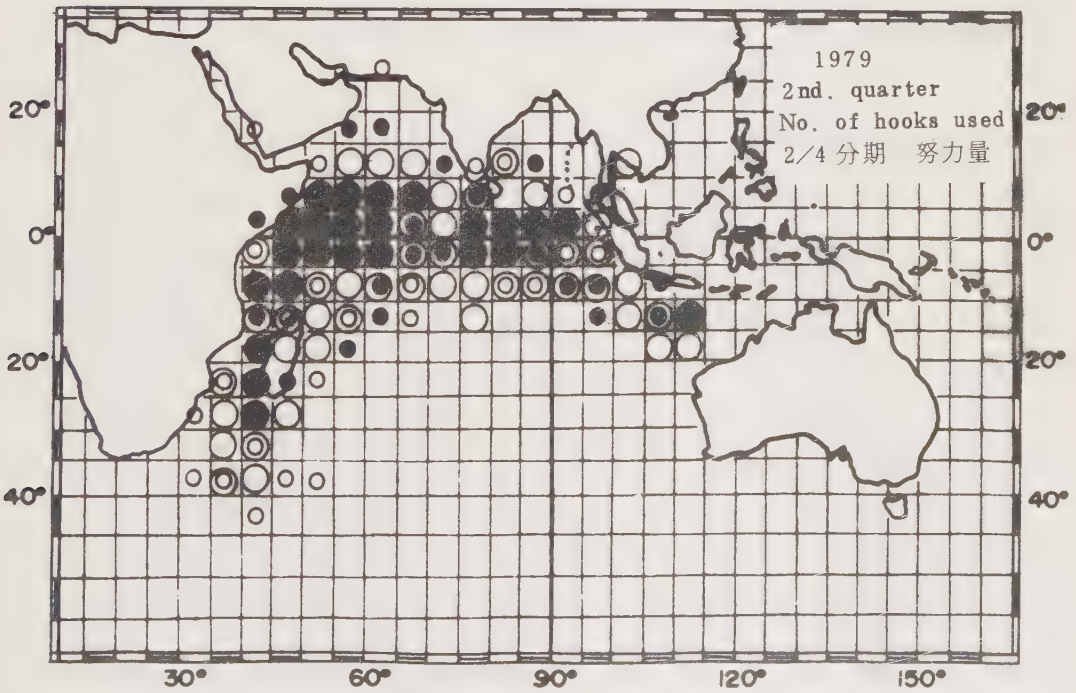

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
Jan. -Dec.
Hook rate of all species
全魚種釣獲率

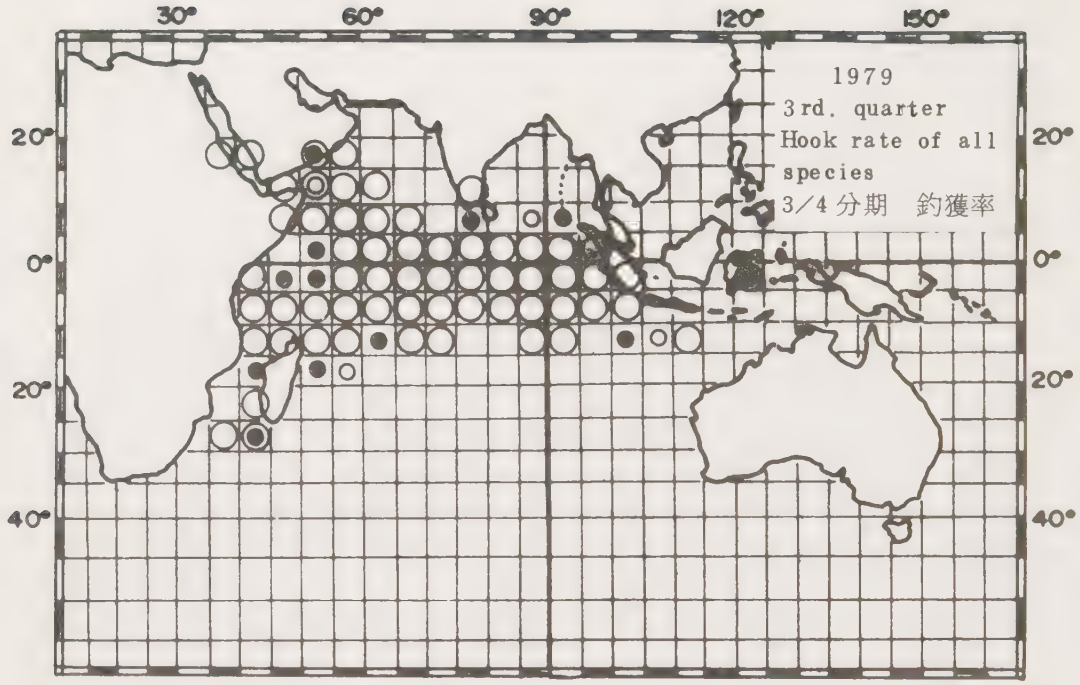

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
Jan. -Dec.
No. of hooks used
總努力量

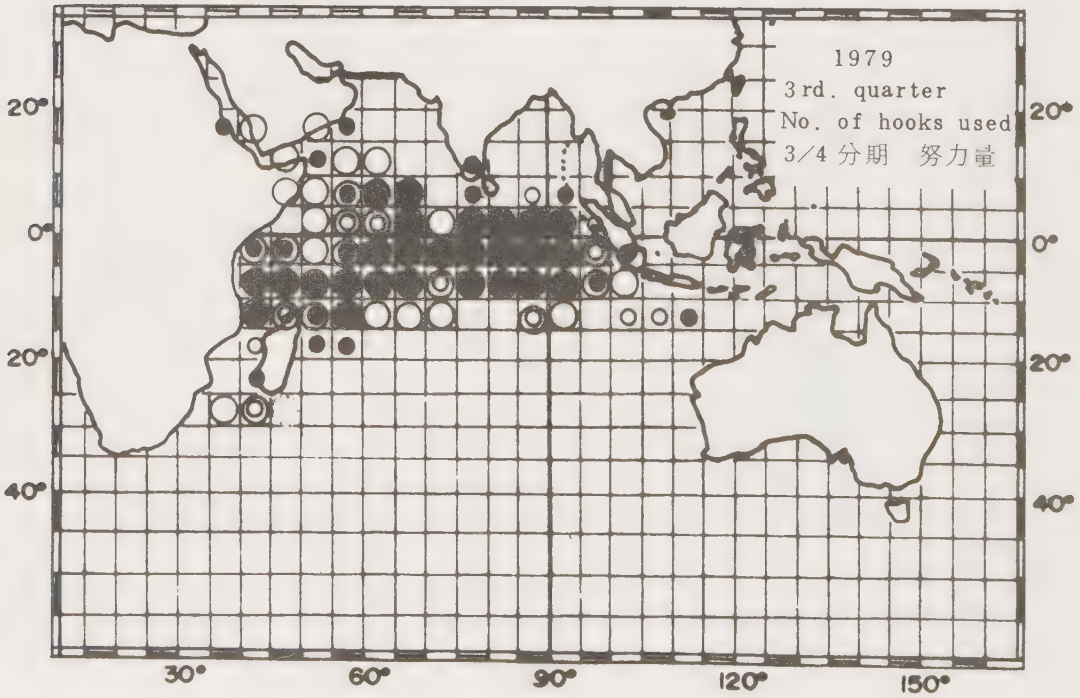

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
1st. quarter
Hook rate of all species
1/4 分期　釣獲率

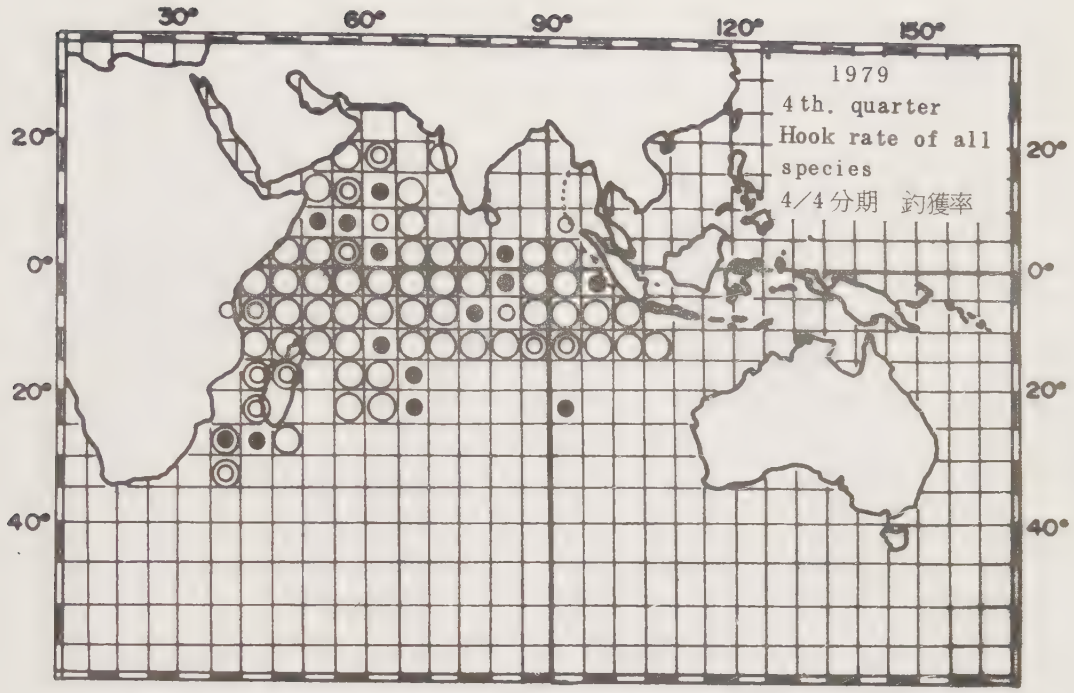

20°
0°
20°
40°
1979
1st. quarter
No. of hooks used
1/4 分期　努力量
30°
60°
90°
120°
150°

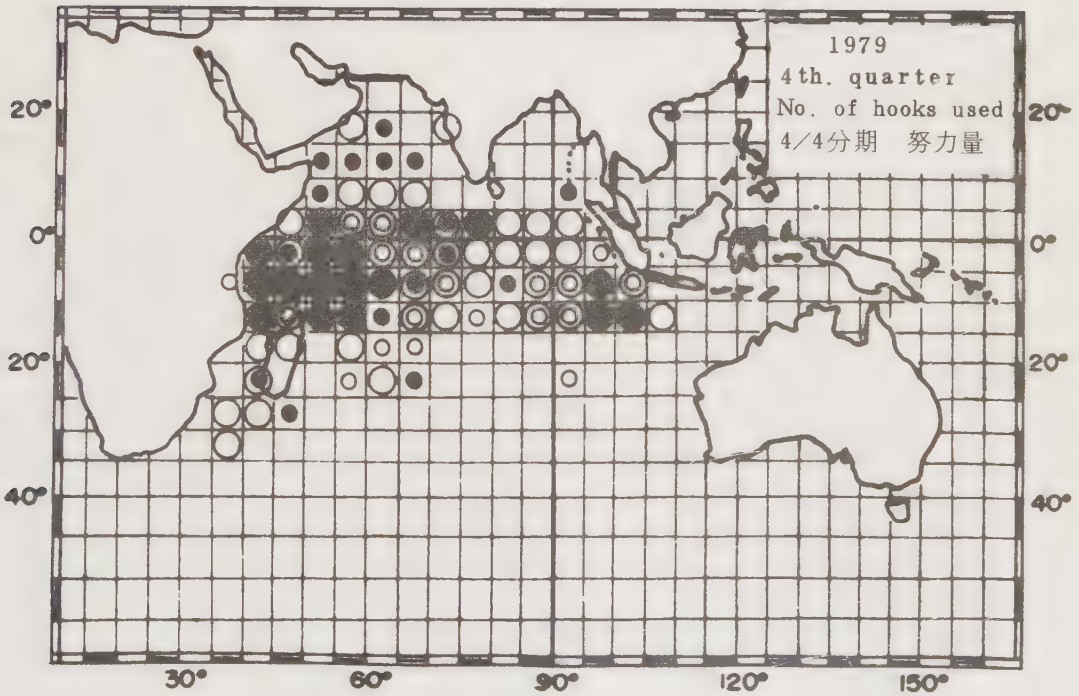

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
2nd. quarter
Hook rate of all species
2/4 分期 釣獲率

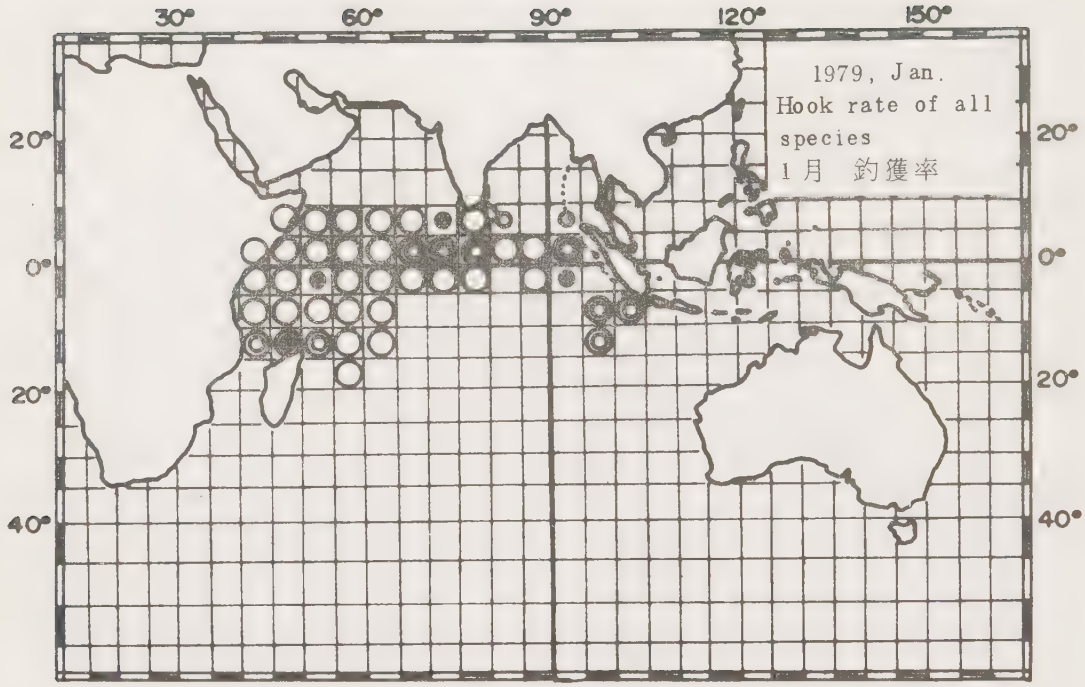

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
2nd. quarter
No. of hooks used
2/4 分期 努力量

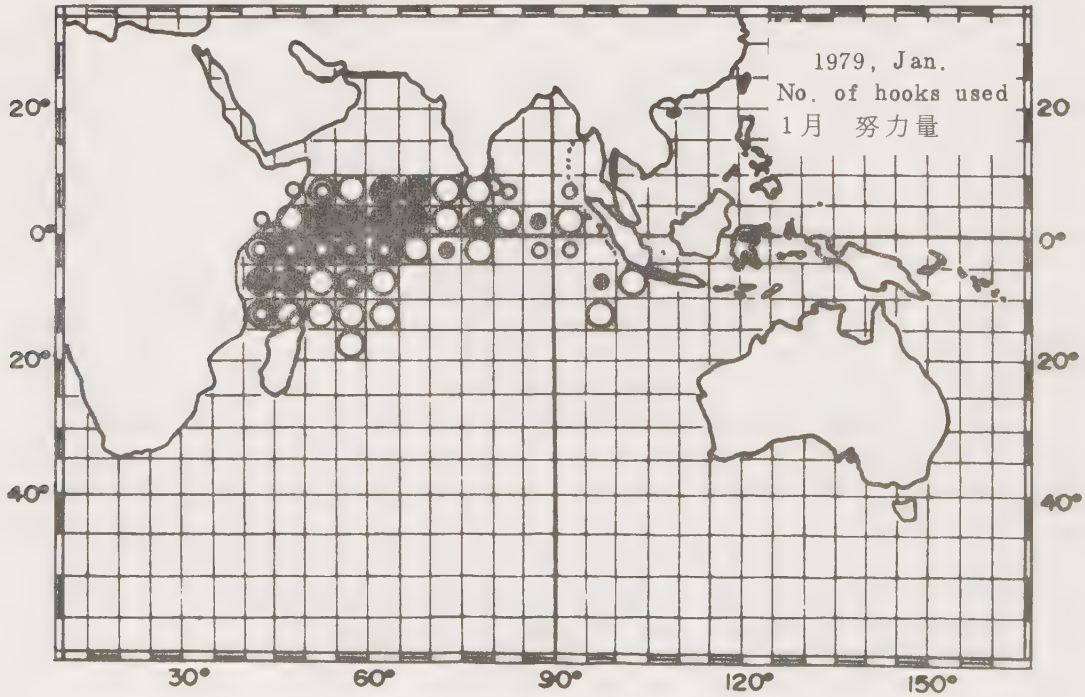

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
3rd. quarter
Hook rate of all species
3/4 分期　釣獲率

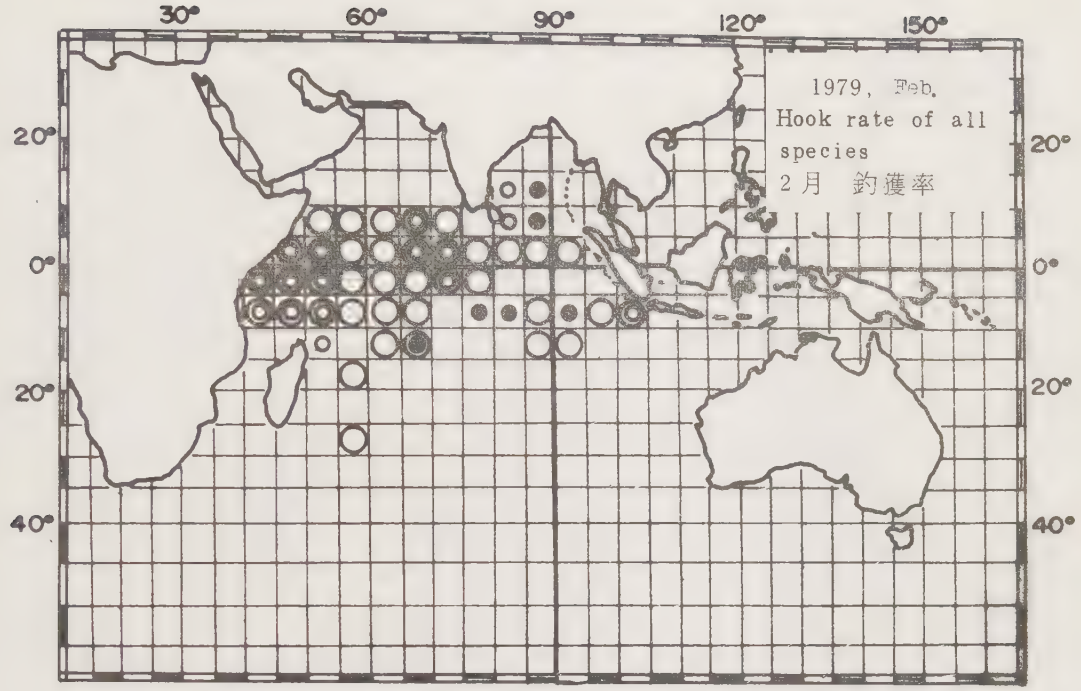

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
3rd. quarter
No. of hooks used
3/4 分期　努力量

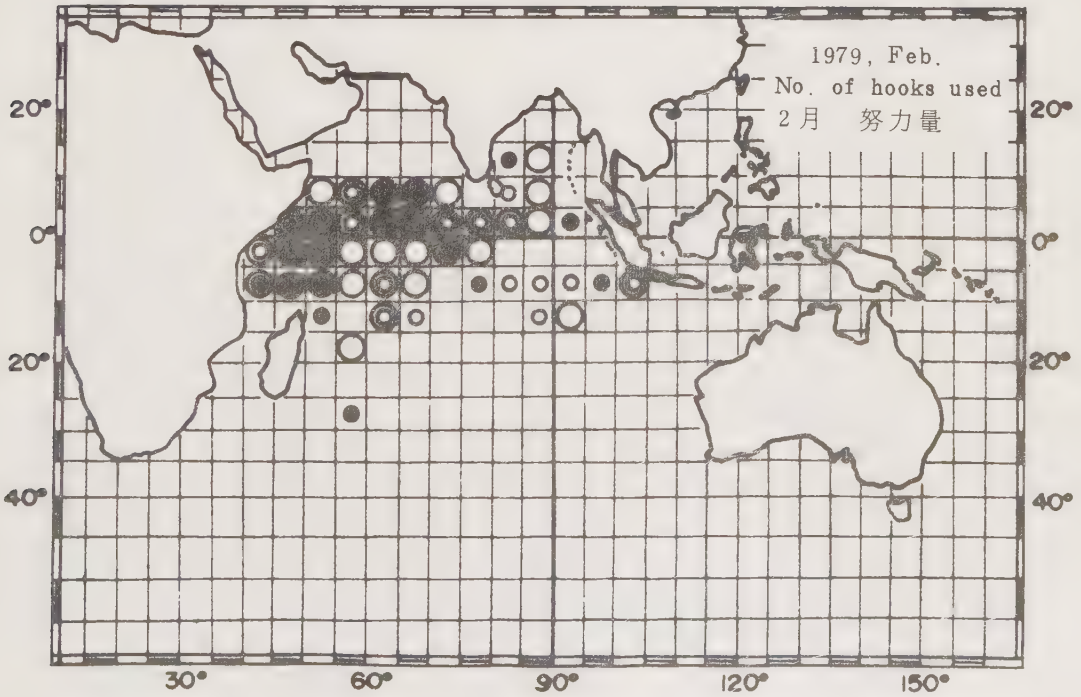

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
4th. quarter
Hook rate of all species
4/4分期 釣獲率

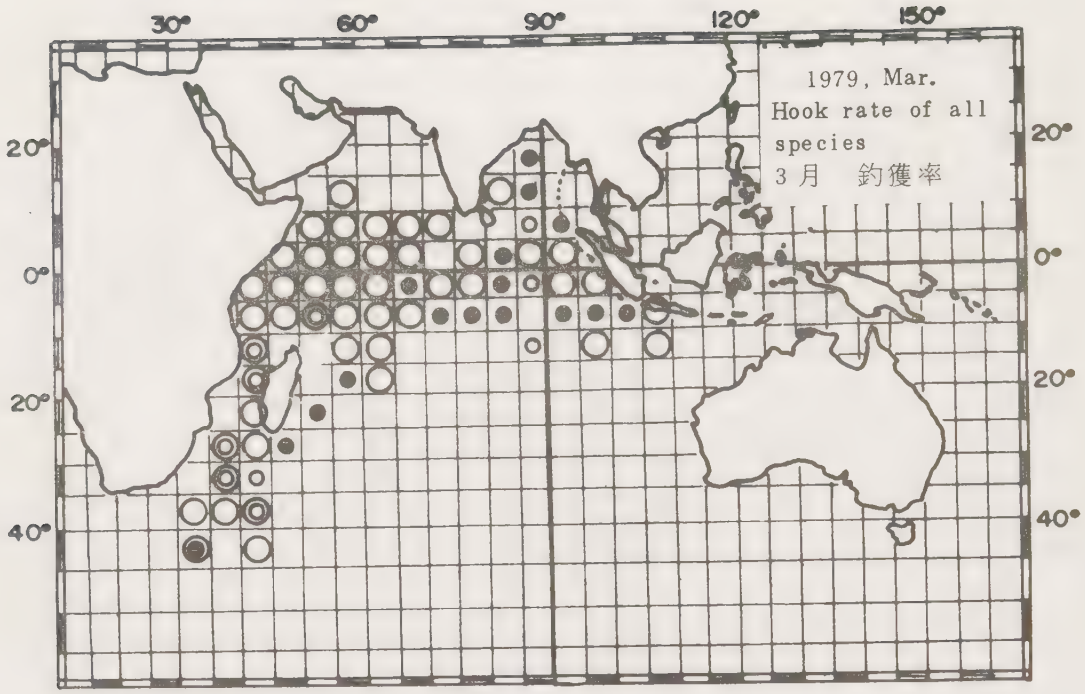

20°
0°
20°
40°
1979
4th. quarter
No. of hooks used
4/4分期 努力量
30°
60°
90°
120°
150°

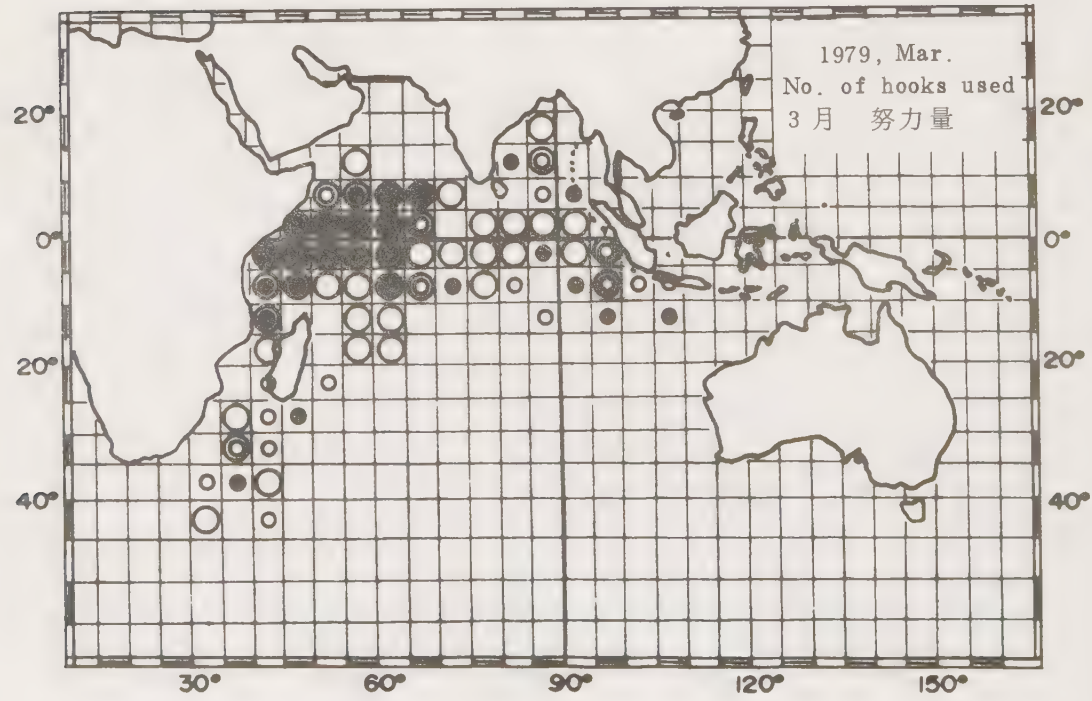

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Jan.
Hook rate of all species
1月 釣獲率

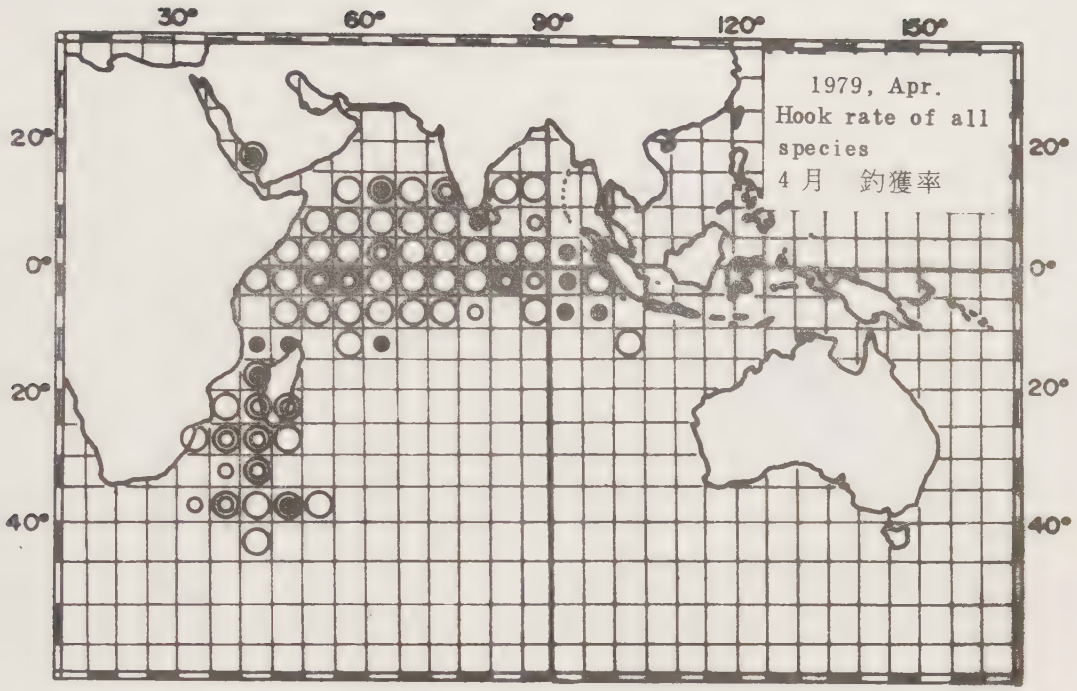

20°
0°
20°
40°
1979, Jan.
No. of hooks used
1月 努力量
30°
60°
90°
120°
150°

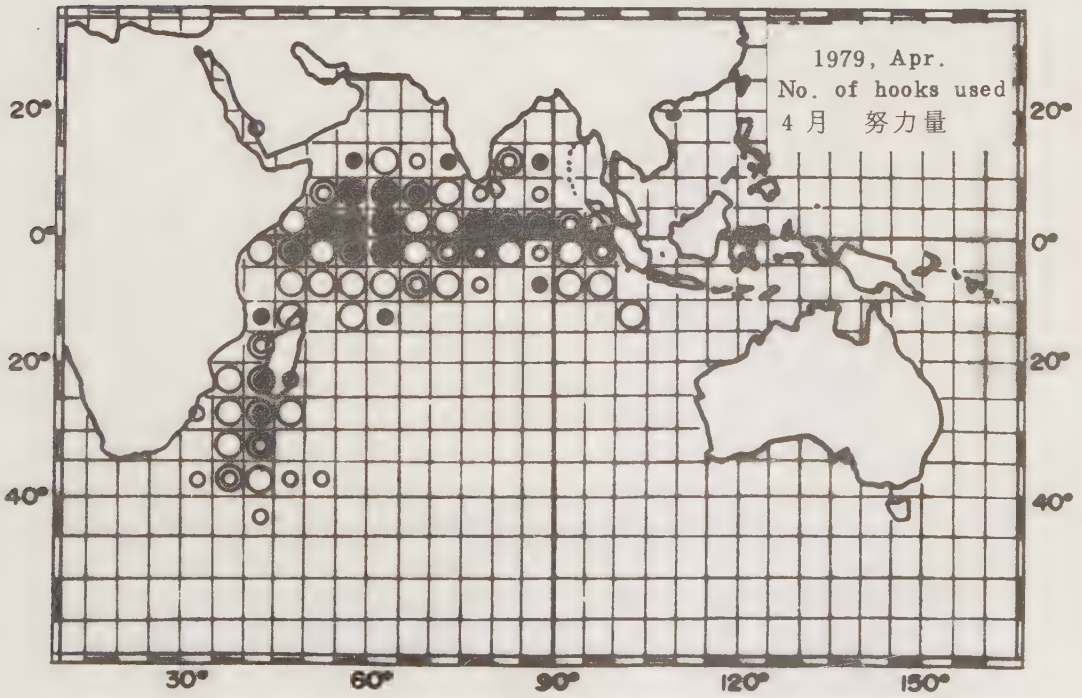

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Feb.
Hook rate of all species
2月 釣獲率

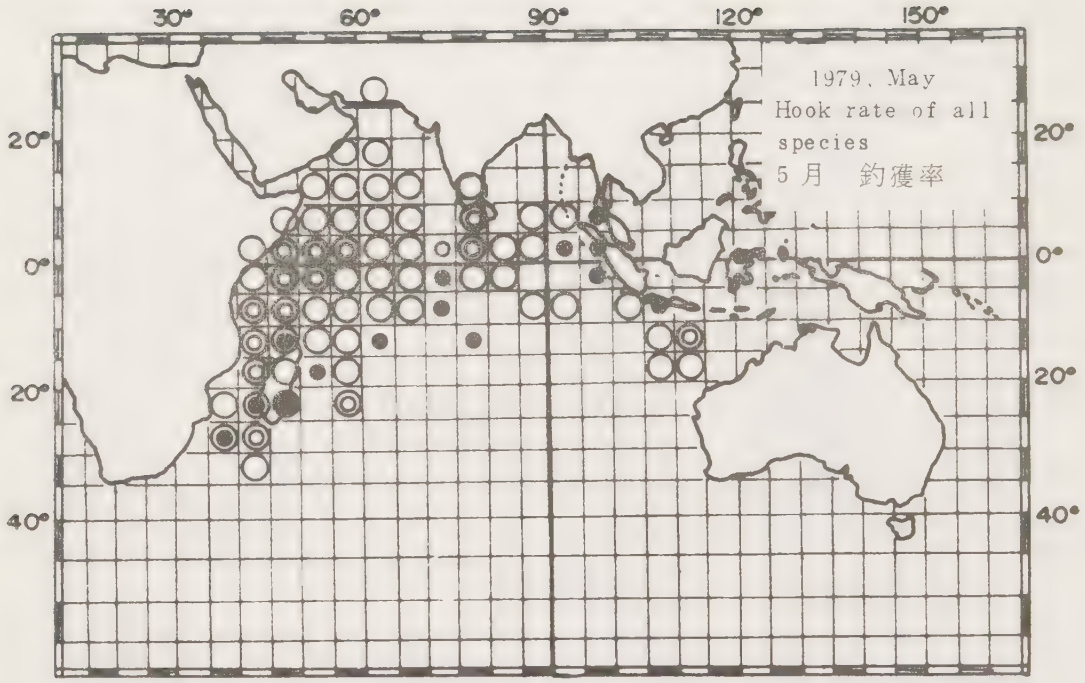

20°
0°
20°
40°
1979, Feb.
No. of hooks used
2月 努力量
30°
60°
90°
120°
150°

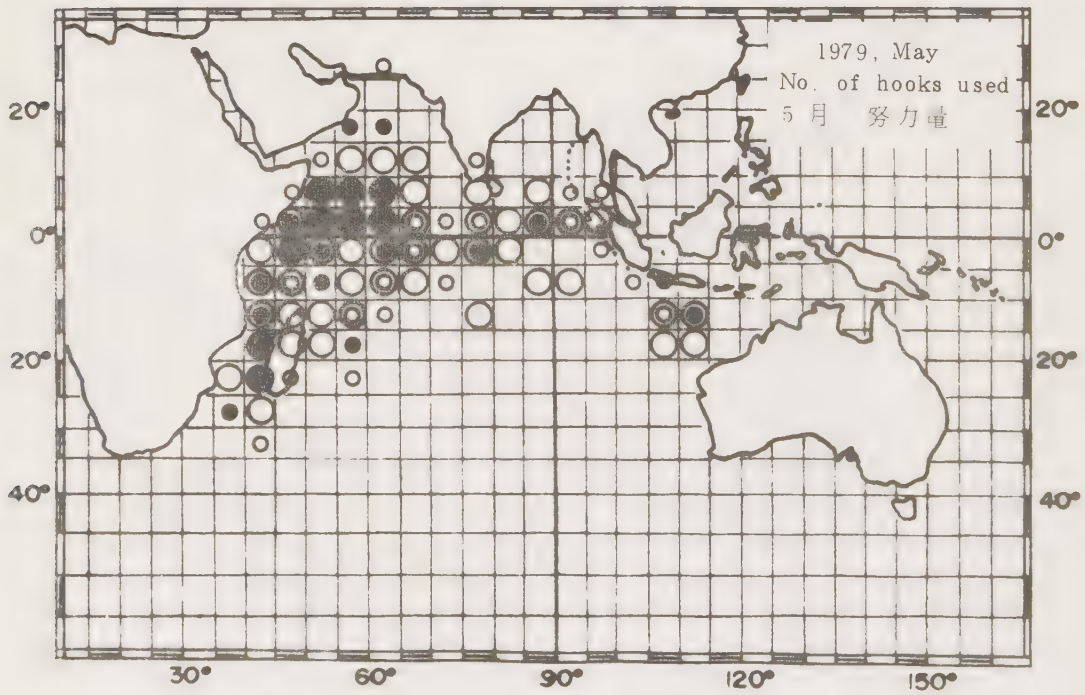

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Mar.
Hook rate of all species
3月　釣獲率

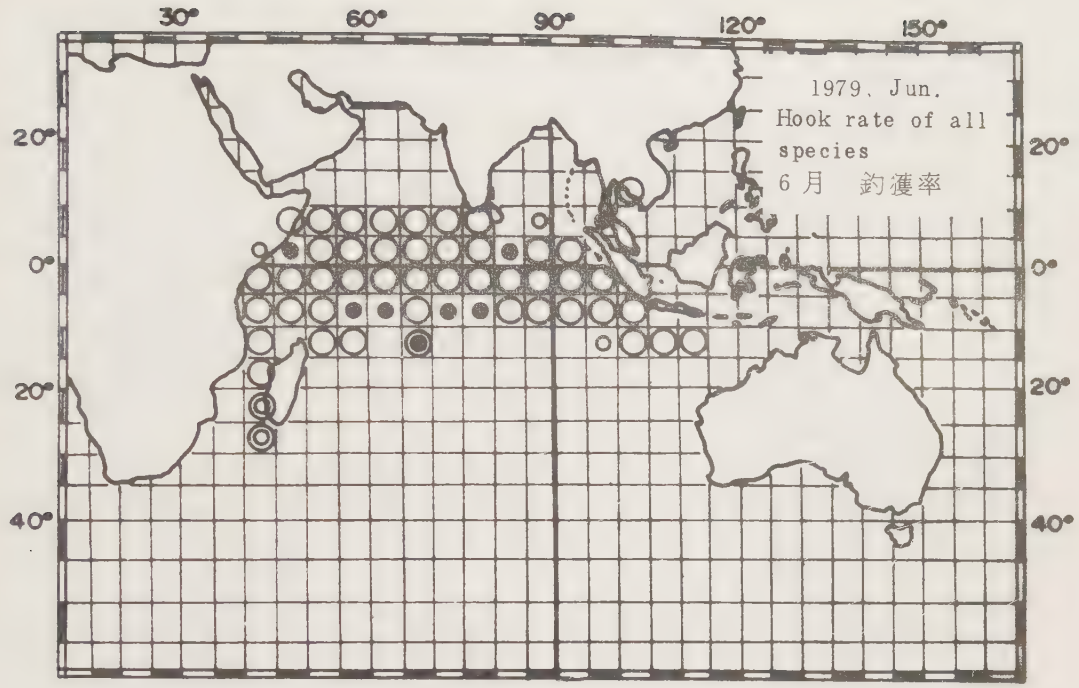

20°
0°
20°
40°
1979, Mar.
No. of hooks used
3月　努力量
30°
60°
90°
120°
150°

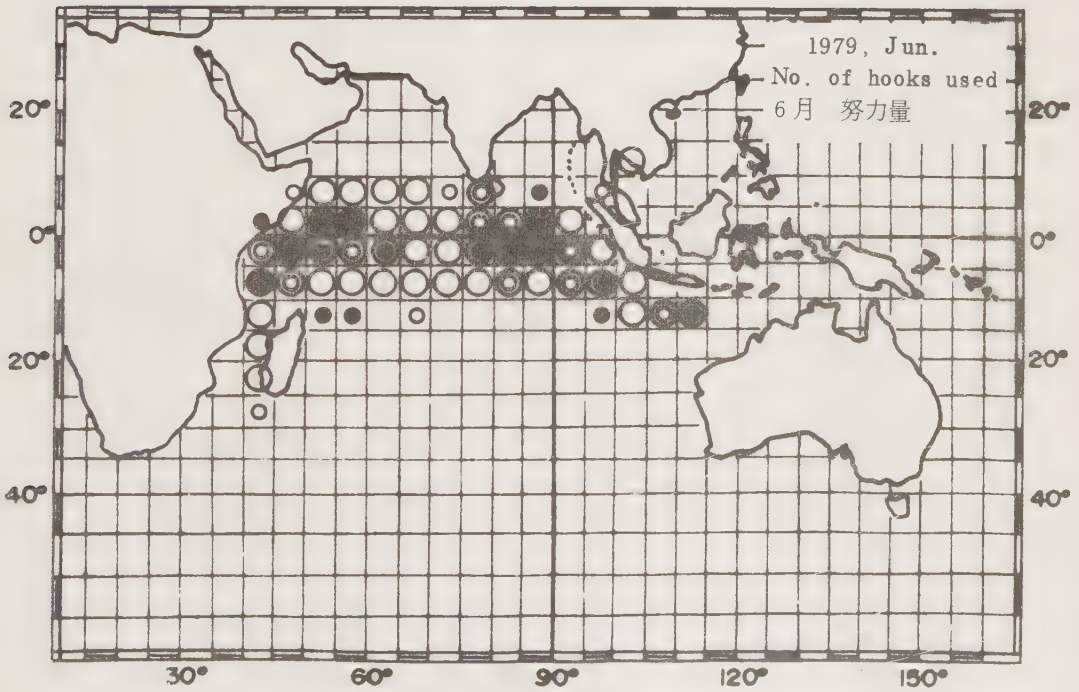

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Apr.
Hook rate of all species
4月　釣獲率

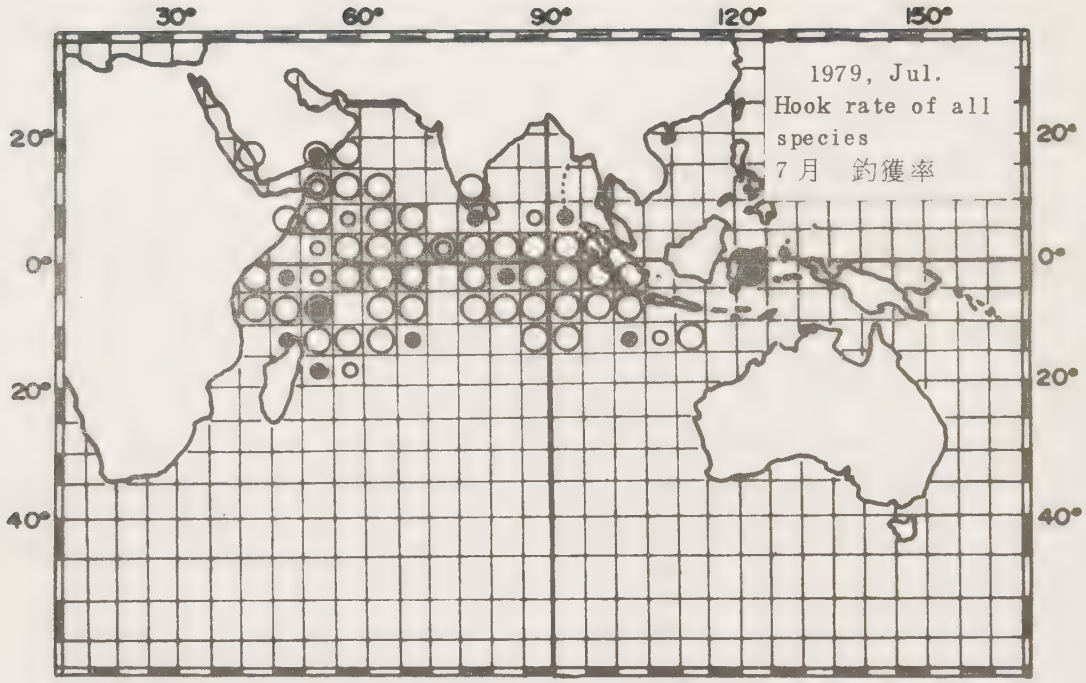

20°
0°
20°
40°
1979, Apr.
No. of hooks used
4月　努力量
30°
60°
90°
120°
150°

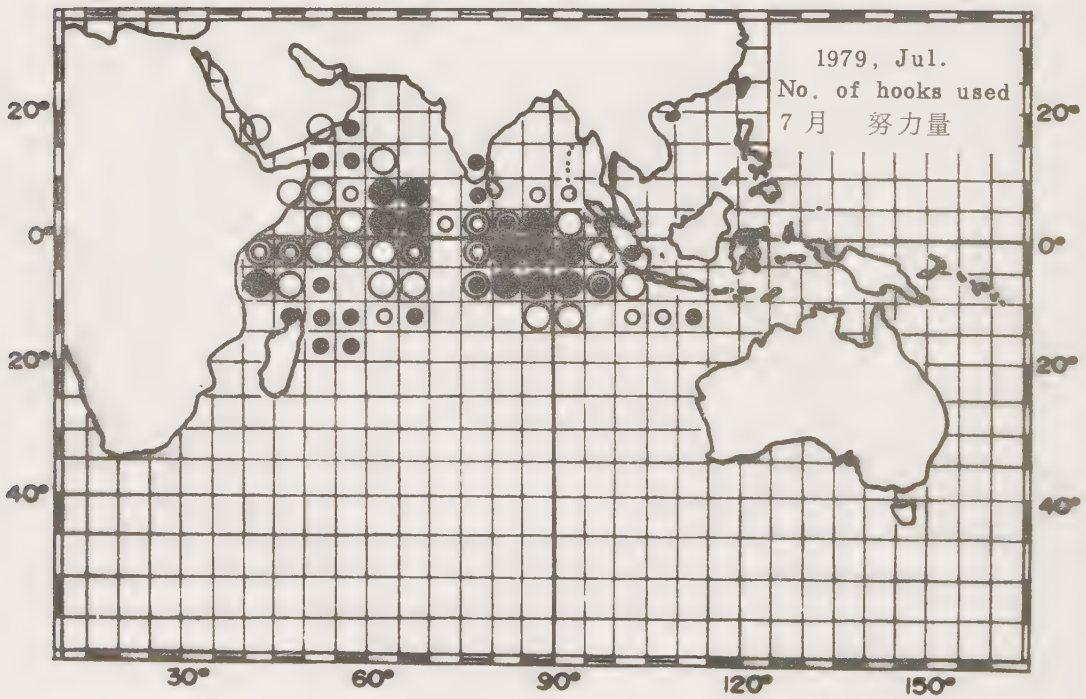

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, May
Hook rate of all species
5月　釣獲率

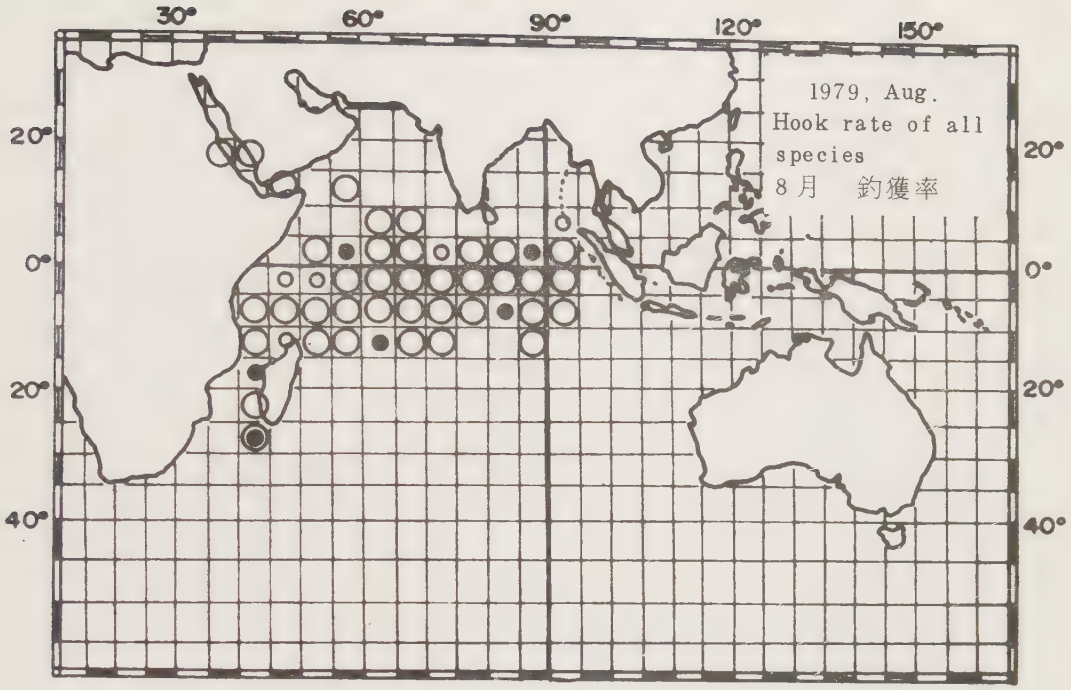

20°
0°
20°
40°
1979, May
No. of hooks used
5月　努力量
30°
60°
90°
120°
150°

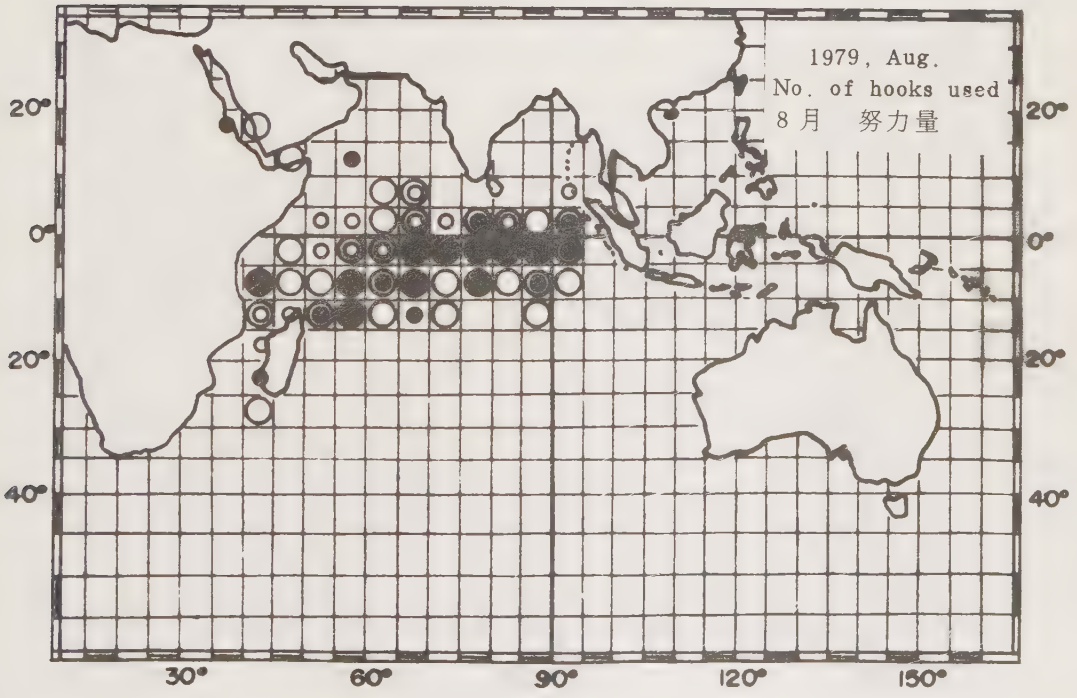

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Jun.
Hook rate of all species
6月 釣獲率

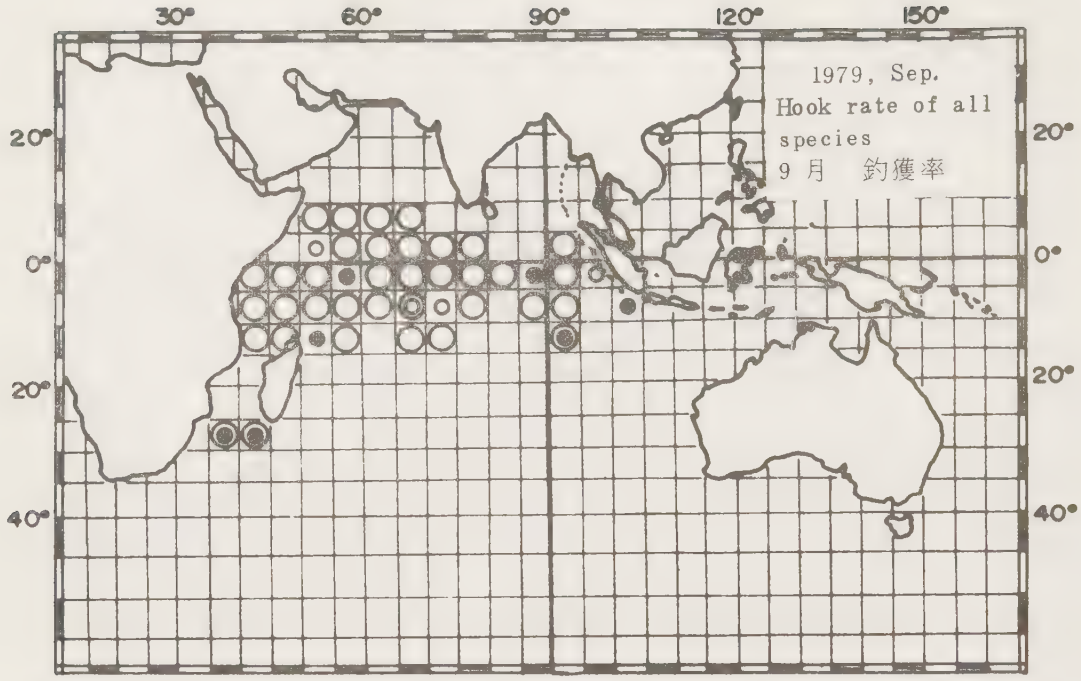

1979, Jun.
No. of hooks used
6月 努力量
20°
0°
20°
40°
30°
60°
90°
120°
150°

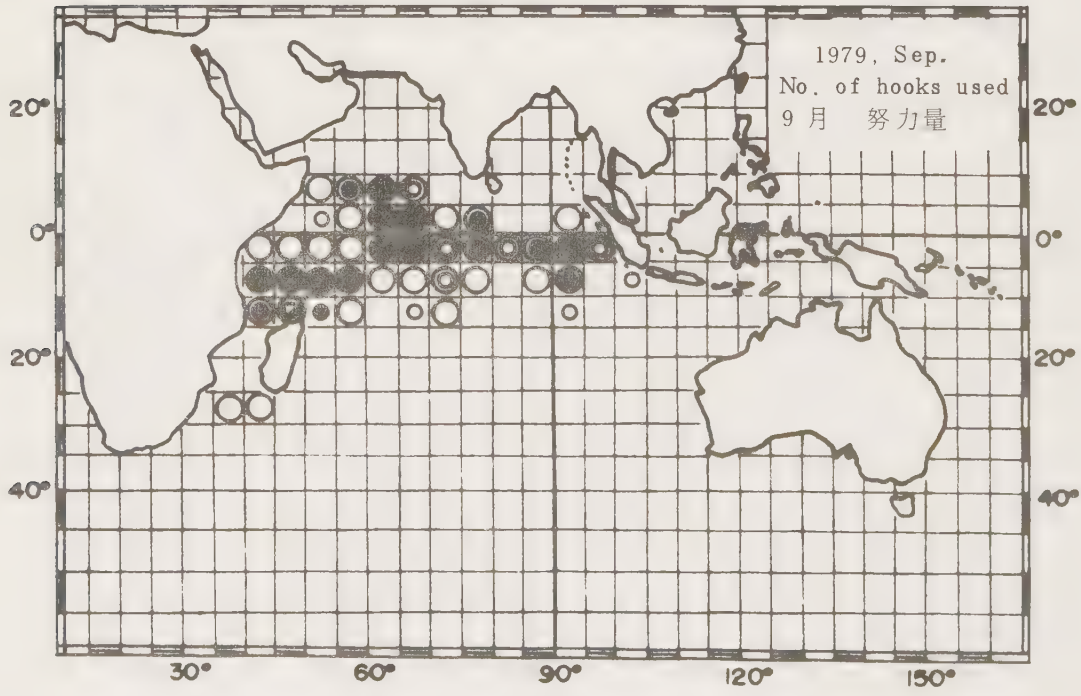

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Jul.
Hook rate of all species
7月　釣獲率

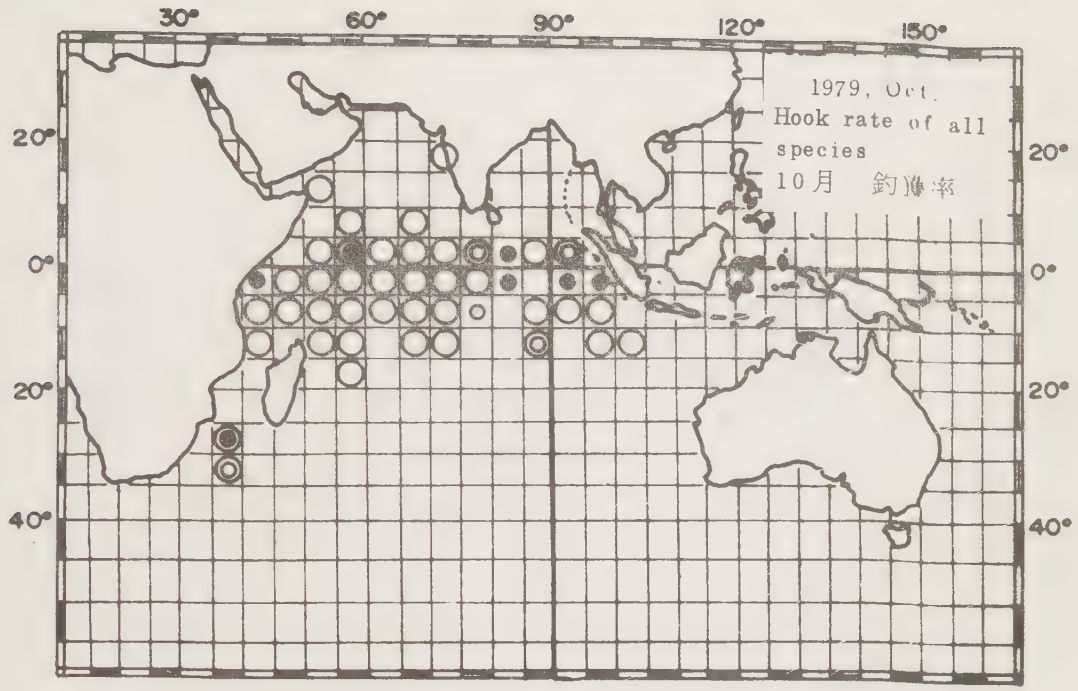

20°
0°
20°
40°
1979, Jul.
No. of hooks used
7月　努力量
30°
60°
90°
120°
150°

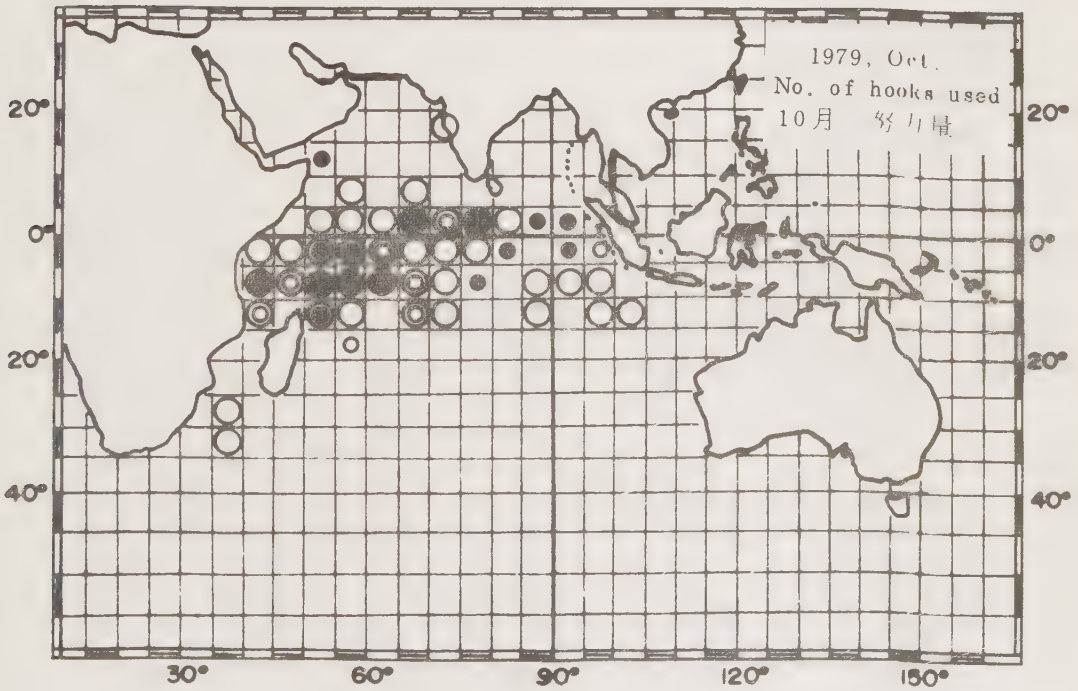

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Aug.
Hook rate of all species
8月　釣獲率

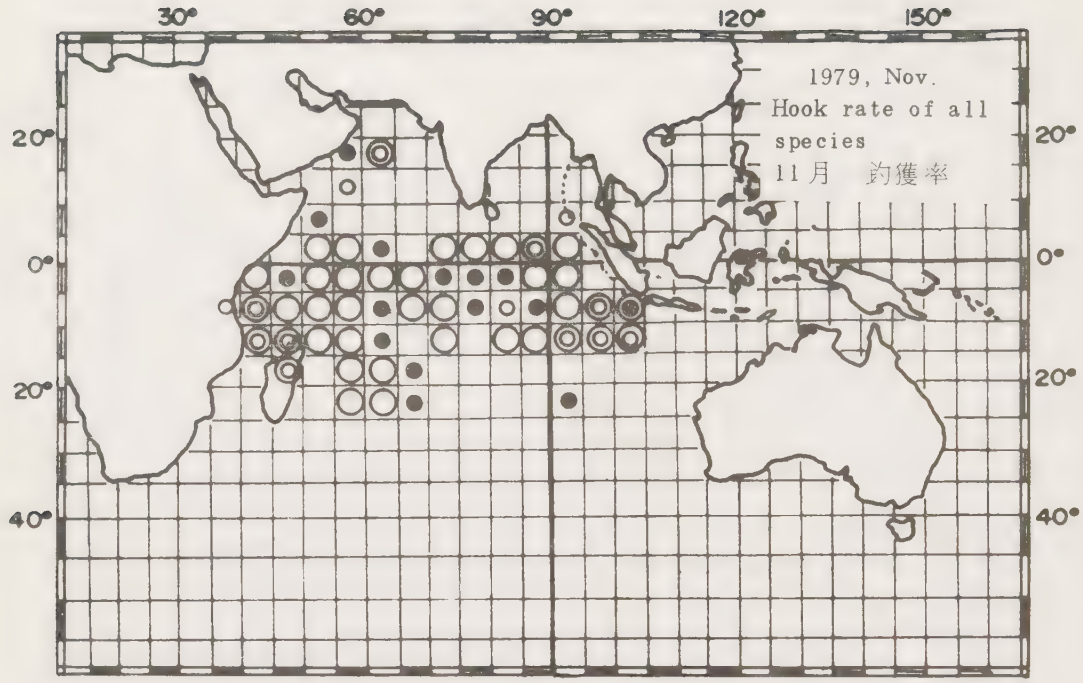

1979, Aug.
No. of hooks used
8月　努力量
20°
0°
20°
40°
30°
60°
90°
120°
150°

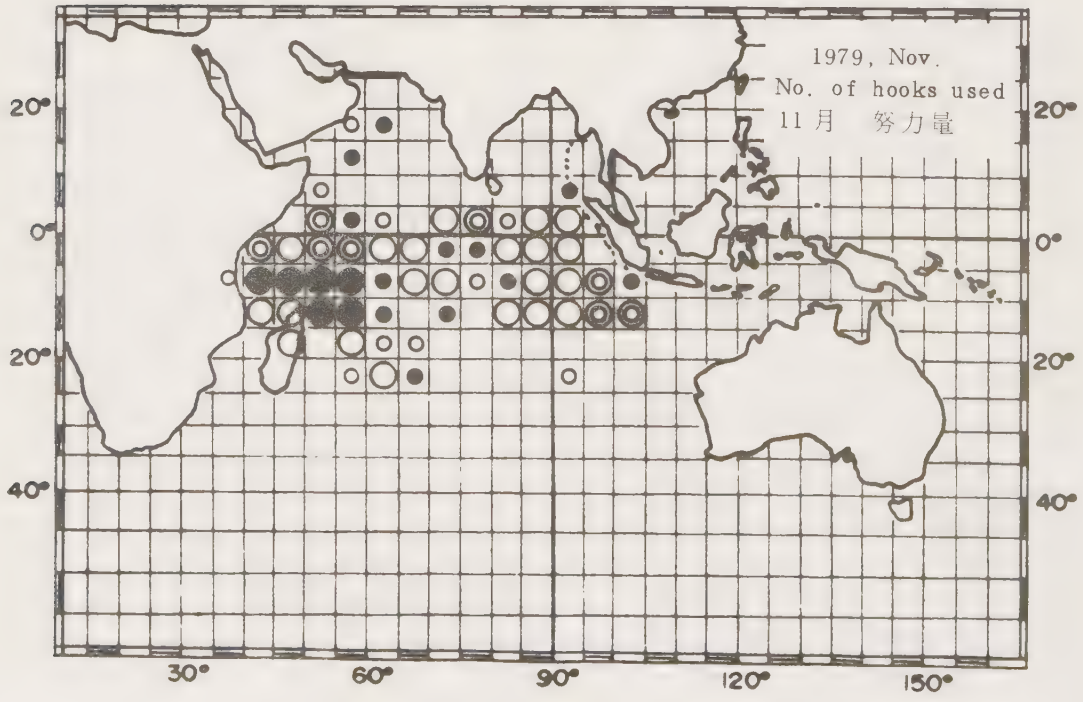

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Sep.
Hook rate of all species
9 月　釣獲率

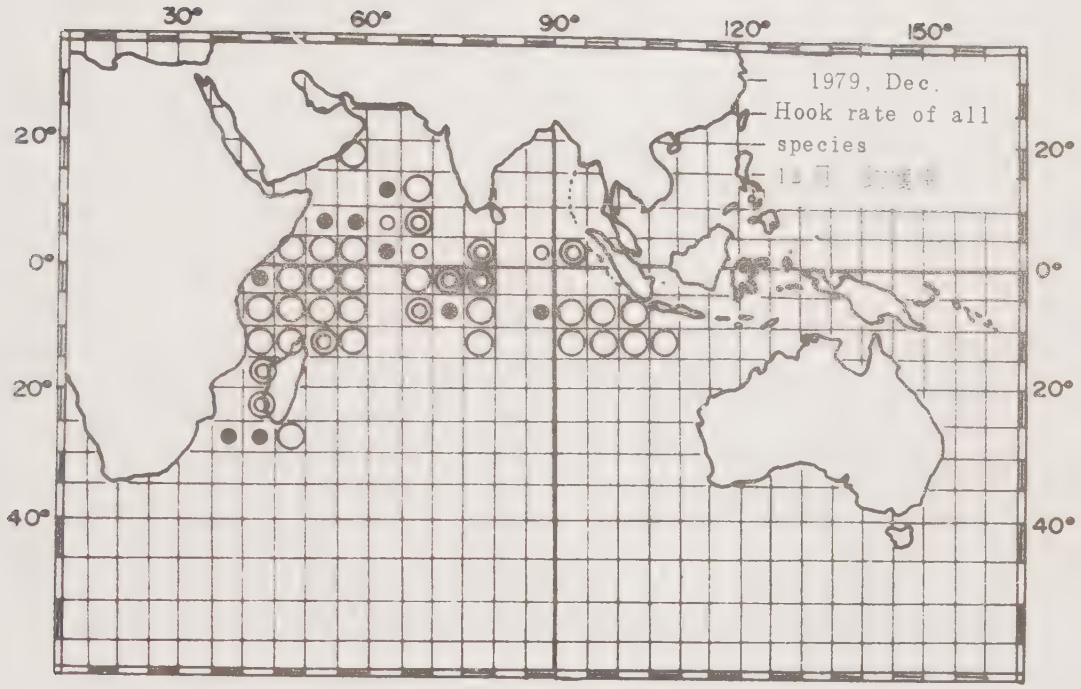

20°
0°
20°
40°
1979, Sep.
No. of hooks used
9 月　努力量
30°
60°
90°
120°
150°

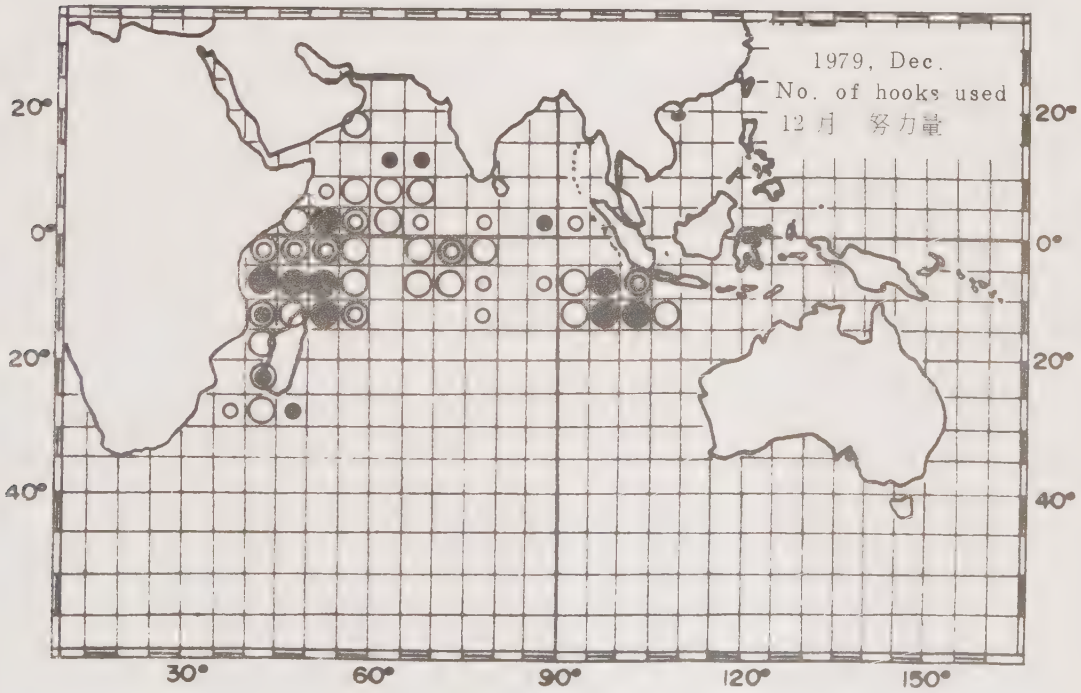

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Oct.
Hook rate of all species
10月　釣獲率


1979, Oct.
No. of hooks used
10月　努力量
20°
0°
20°
40°
30°
60°
90°
120°
150°


30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Nov.
Hook rate of all species
11月　釣獲率


20°
0°
20°
40°
1979, Nov.
No. of hooks used
11月　努力量
30°
60°
90°
120°
150°


30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Dec.
Hook rate of all species
12月

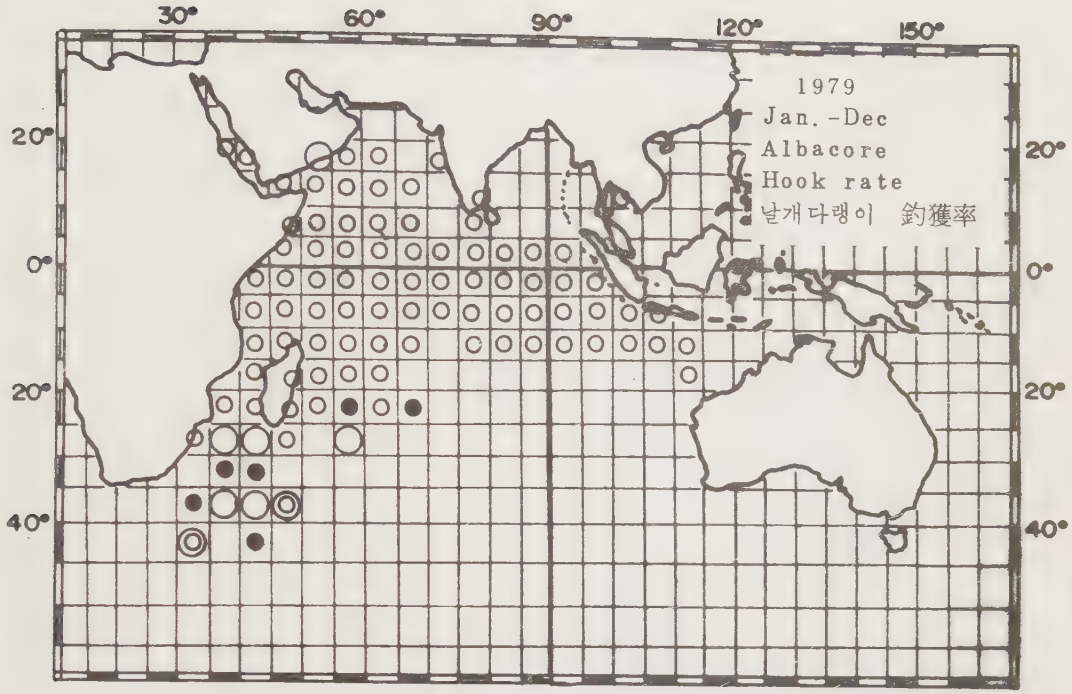

20°
0°
20°
40°
1979, Dec.
No. of hooks used
12月 努力量
30°
60°
90°
120°
150°

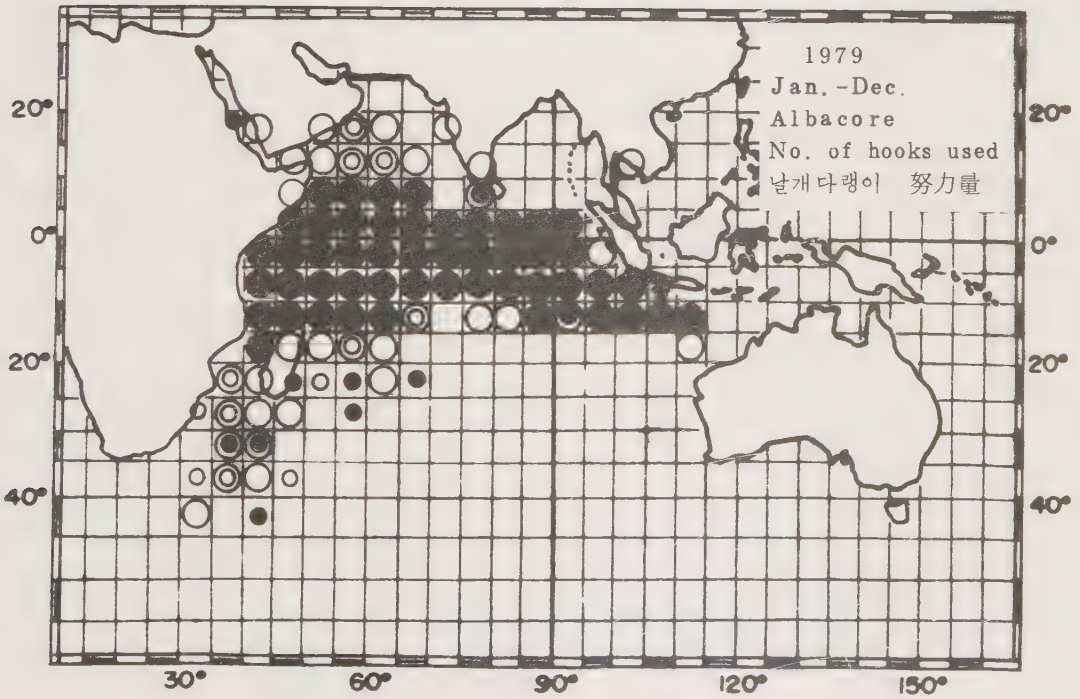
날개다랑이, 황다랑이, 눈다랑이
釣獲率 및 漁獲努力 分布圖

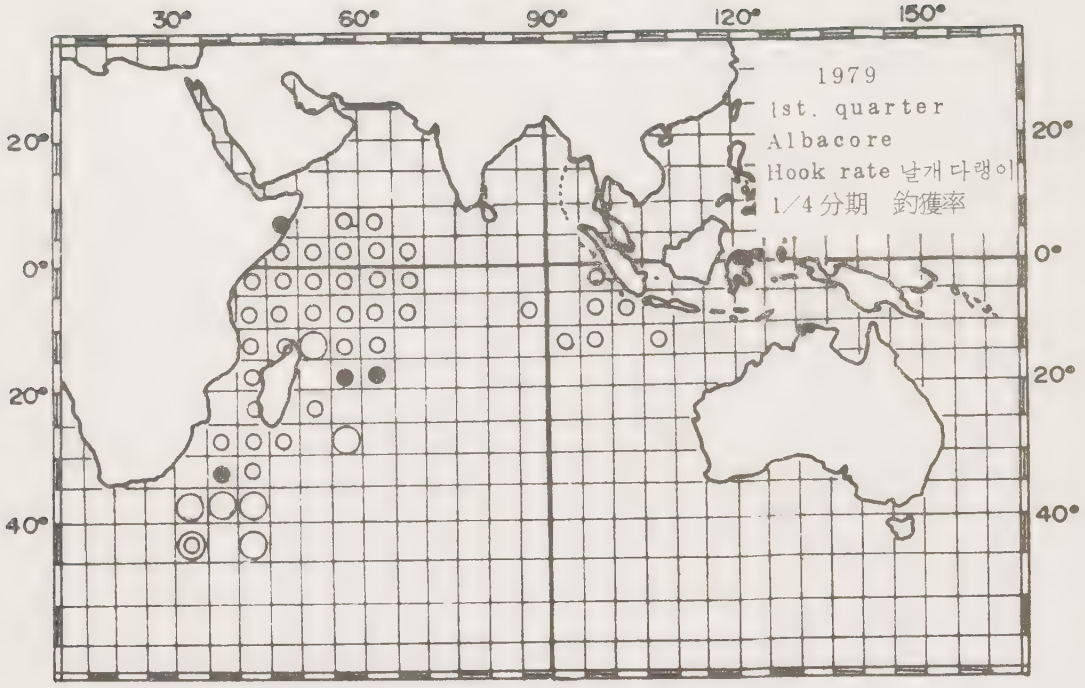
Albacore, Yellowfin, Bigeye
Hook rate and fishing effort

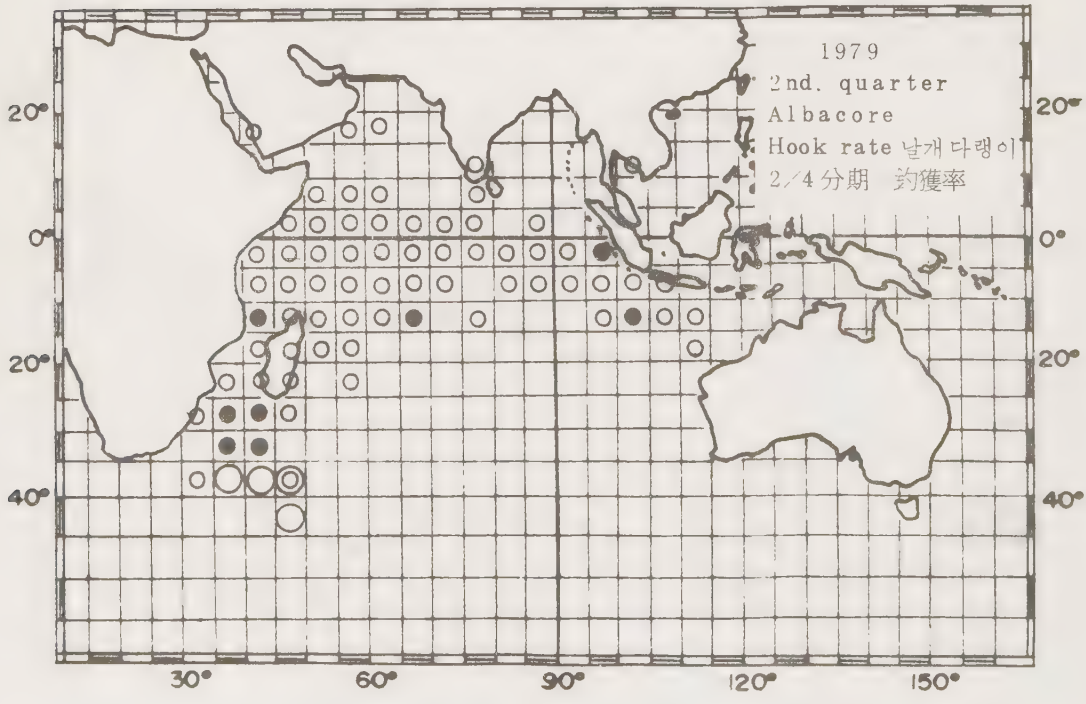
날 개 다 랭 이

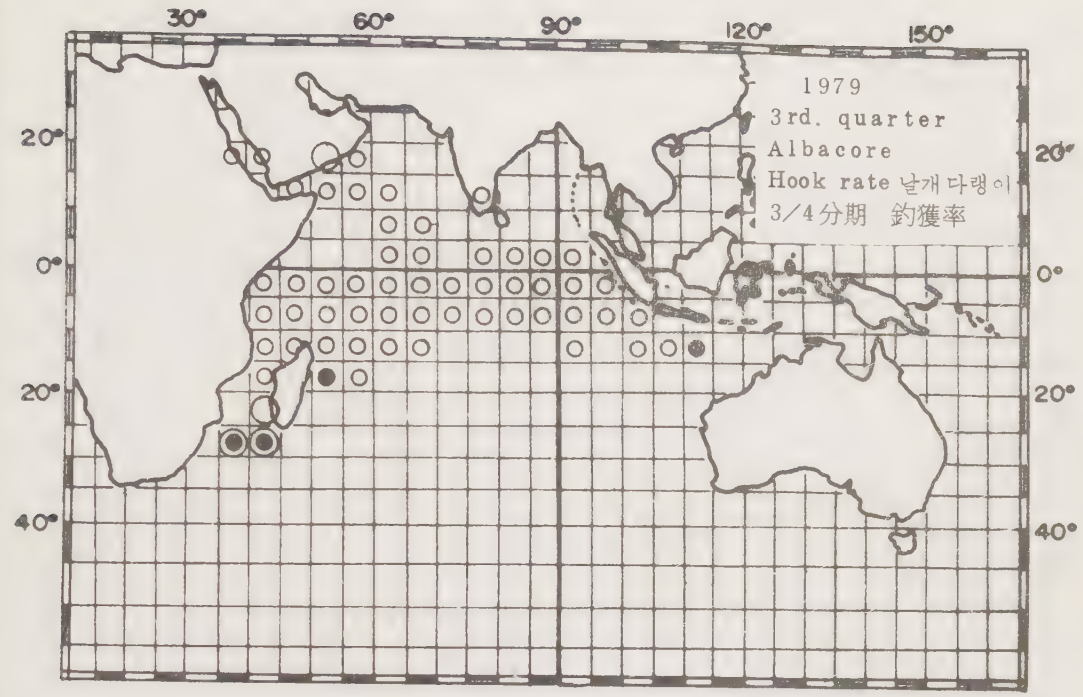
Albacore

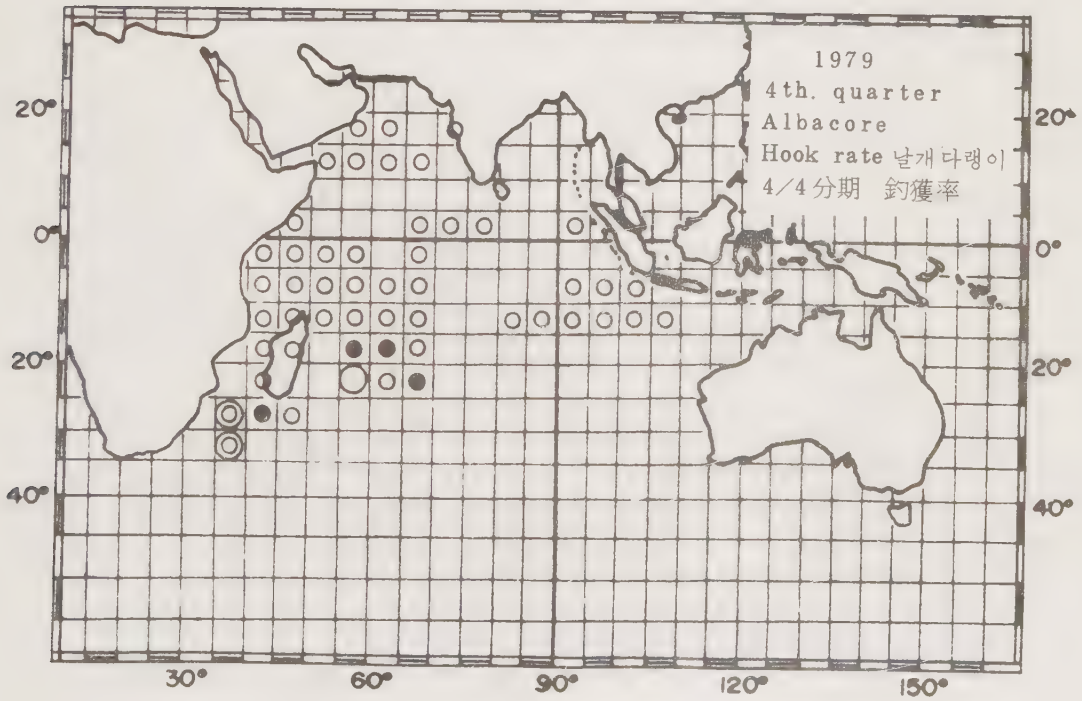

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
Jan.-Dec
Albacore
Hook rate
날개다랑이 釣獲率

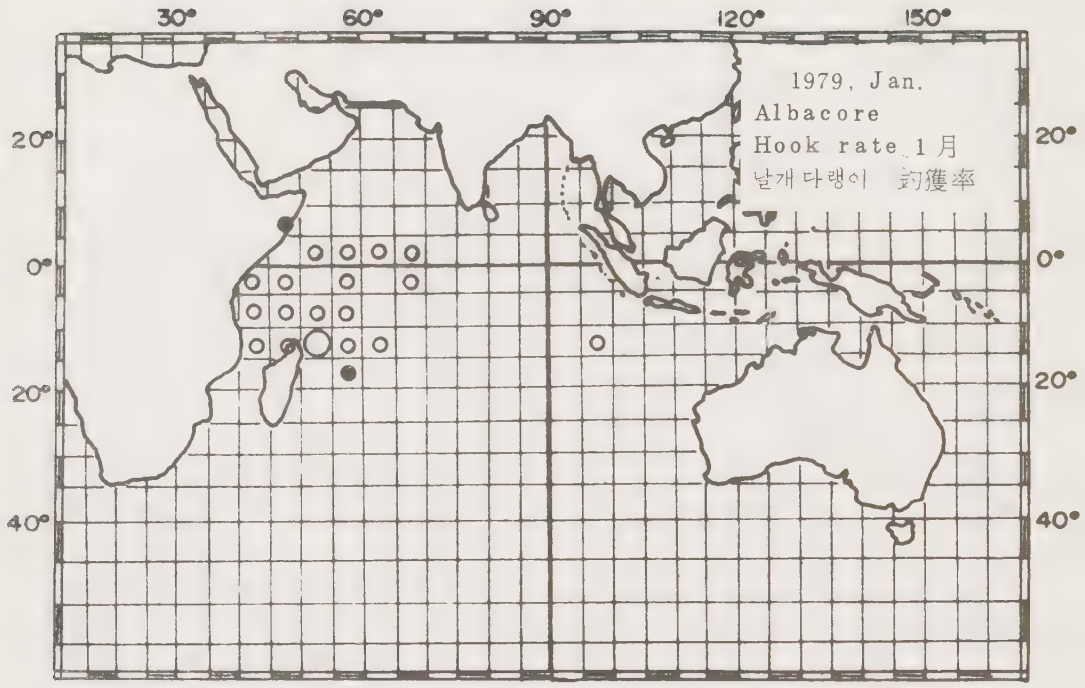

1979
Jan.-Dec.
Albacore
No. of hooks used
날개다랑이 努力量
20°
0°
20°
40°
30°
60°
90°
120°
150°

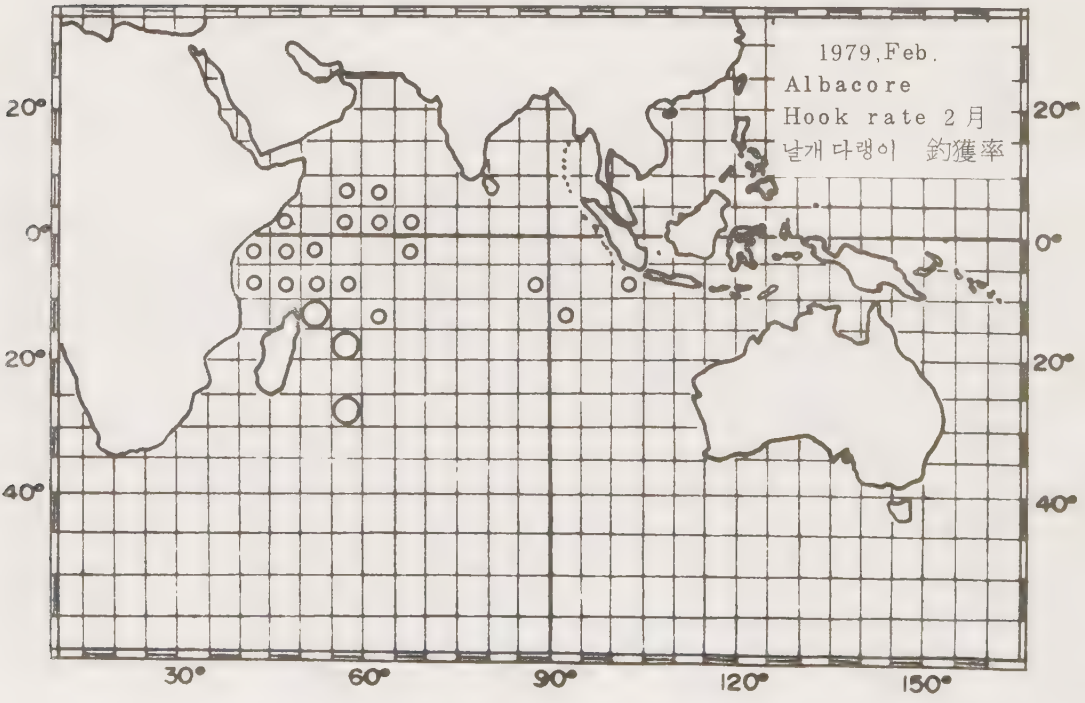

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
1st. quarter
Albacore
Hook rate 날개다랑이
1/4分期 釣獲率

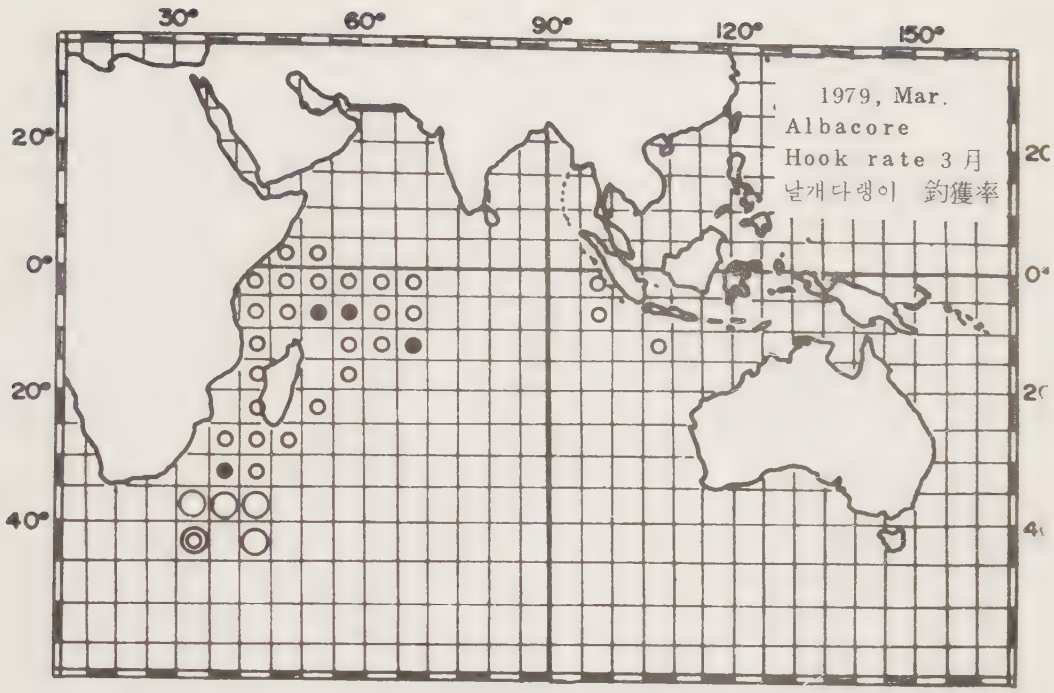

1979
2nd. quarter
Albacore
Hook rate 날개다랑이
2/4分期 釣獲率
20°
0°
20°
40°
30°
60°
90°
120°
150°

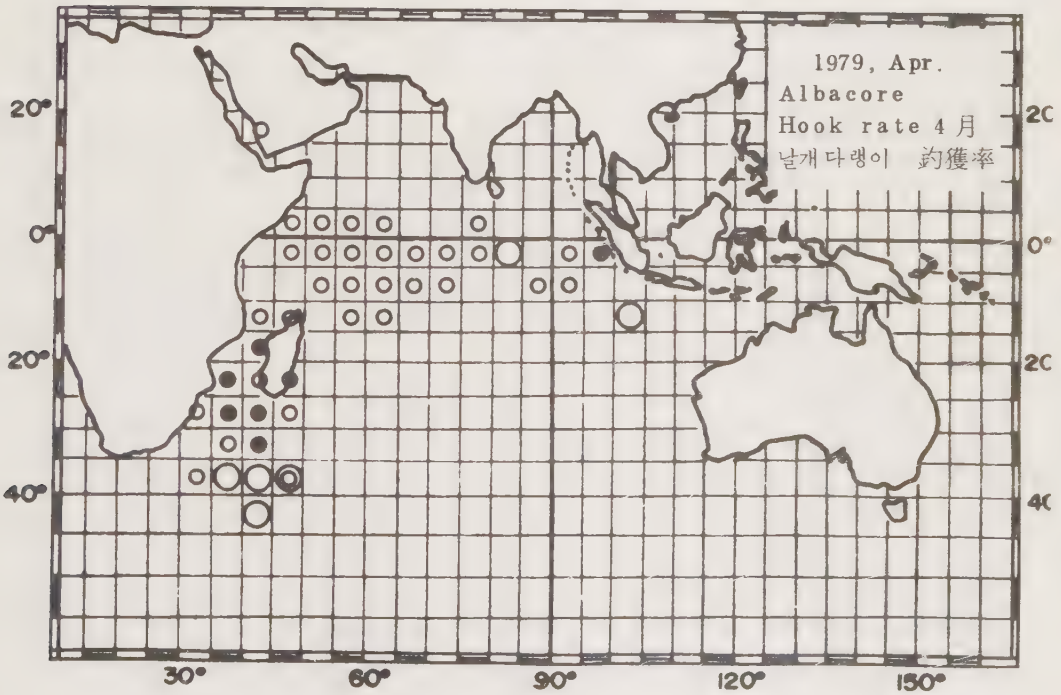

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
3rd. quarter
Albacore
Hook rate 날개다랑이
3/4分期 釣獲率


20°
0°
20°
40°
1979
4th. quarter
Albacore
Hook rate 날개다랑이
4/4分期 釣獲率
30°
60°
90°
120°
150°


30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Jan.
Albacore
Hook rate 1月
날개다랑이 釣獲率


1979, Feb.
Albacore
Hook rate 2月
날개다랑이 釣獲率
20°
0°
20°
40°
30°
60°
90°
120°
150°


30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Mar.
Albacore
Hook rate 3月
날개다랑이 釣獲率


1979, Apr.
Albacore
Hook rate 4月
날개다랑이 釣獲率
20°
0°
20°
40°
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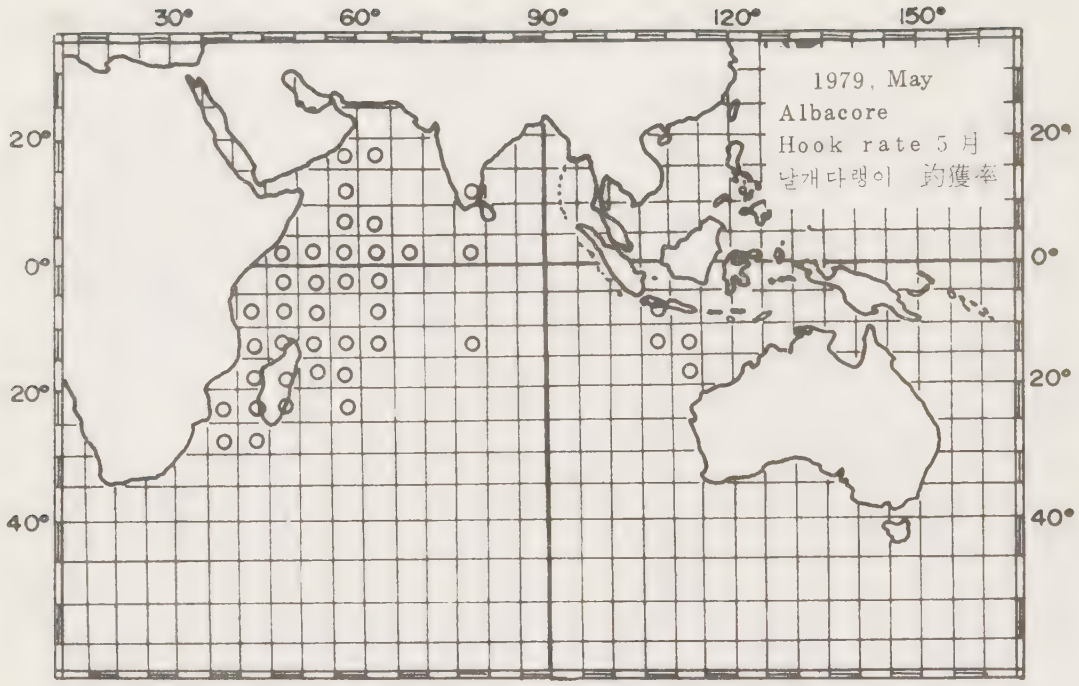
60°
90°
120°
150°


30°
60°
90°
120°
150°
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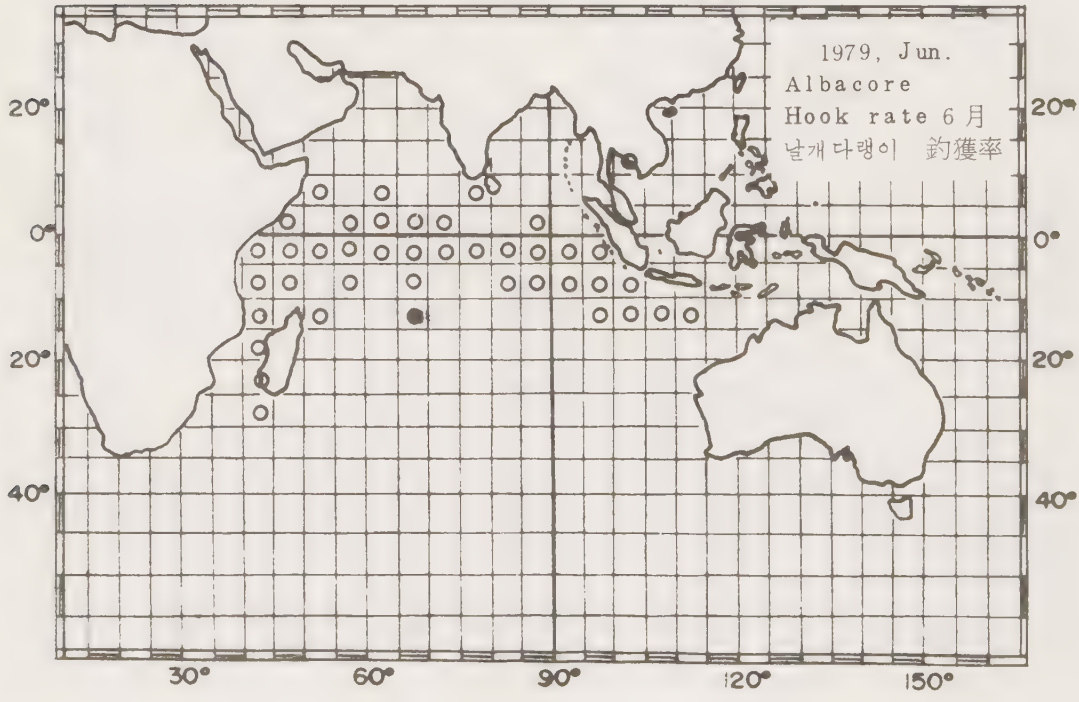
0°
20°
40°
1979, May
Albacore
Hook rate 5月
날개다랑이 釣獲率


20°
0°
20°
40°
1979, Jun.
Albacore
Hook rate 6月
날개다랑이 釣獲率
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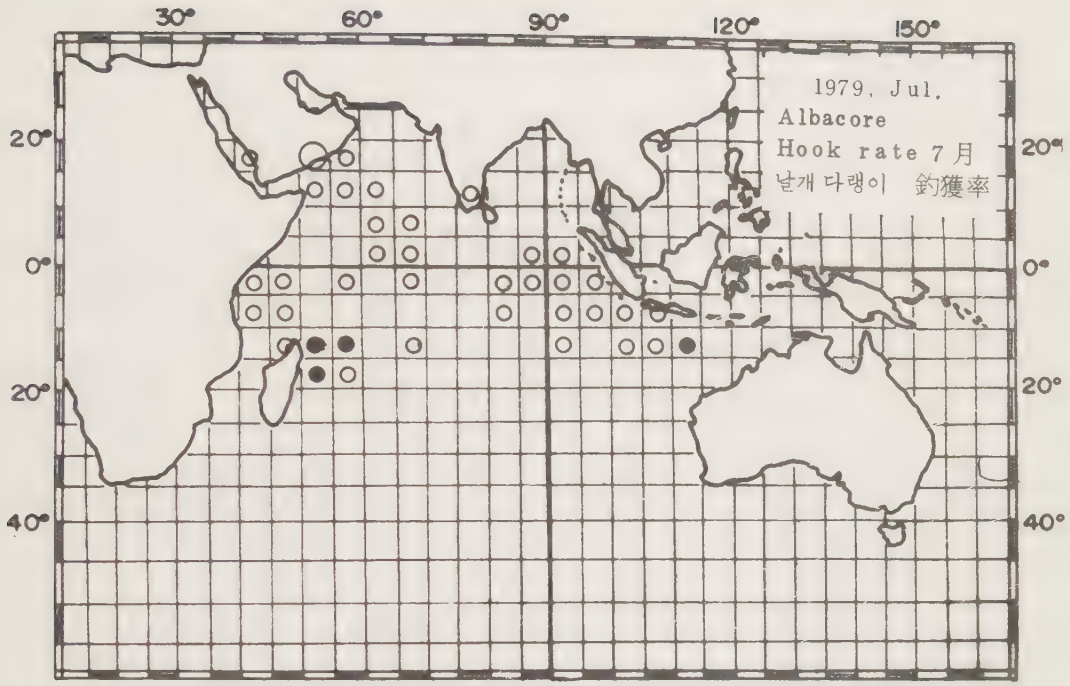
90°
120°
150°


30°
60°
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0°
20°
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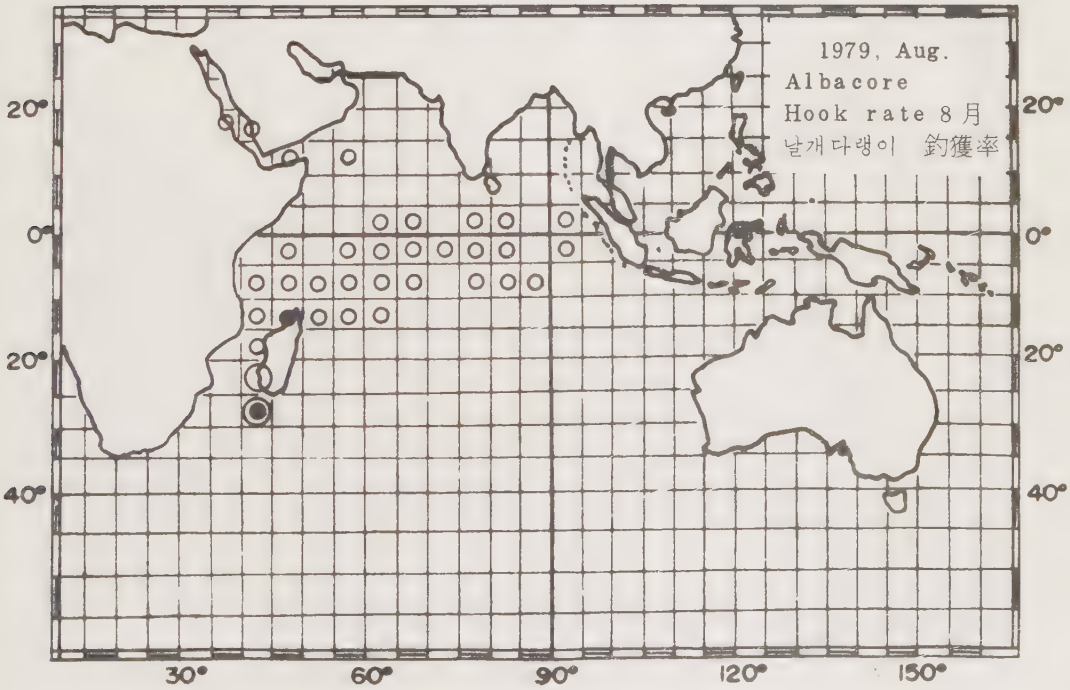
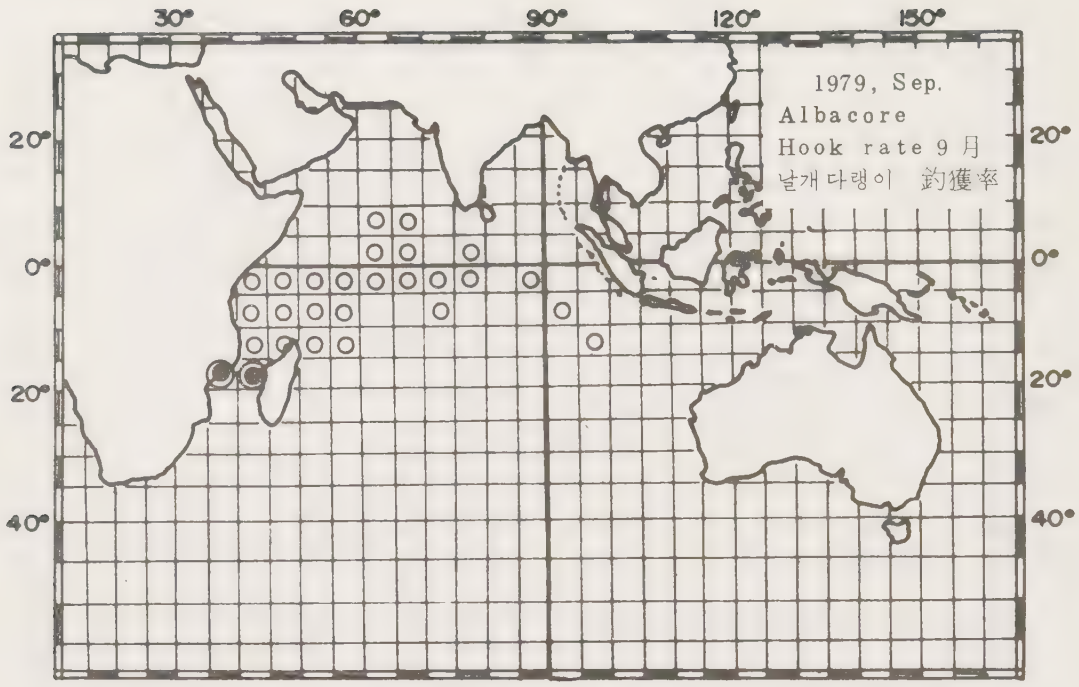
1979, Jul.
Albacore
Hook rate 7月
날개다랑이 釣獲率


20°
0°
20°
40°
1979, Aug.
Albacore
Hook rate 8月
날개다랑이 釣獲率
30°
60°
90°
120°
150°


30°
60°
90°
120°
150°
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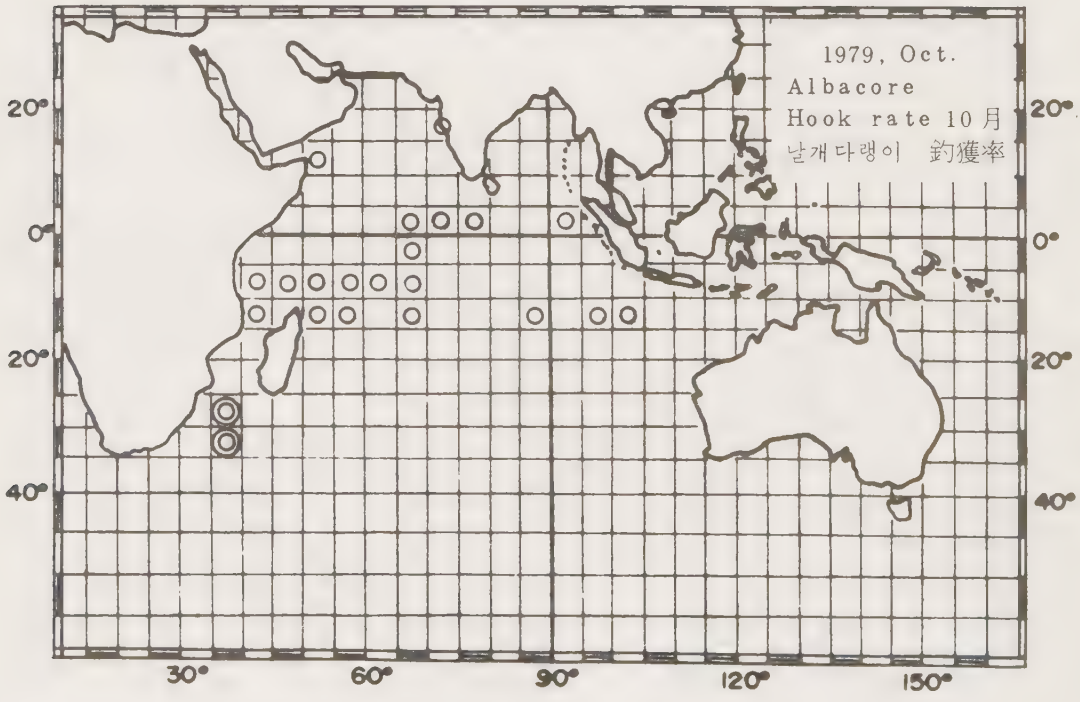
0°
20°
40°
1979, Sep.
Albacore
Hook rate 9 月
날개다랑이 釣獲率


20°
0°
20°
40°
1979, Oct.
Albacore
Hook rate 10 月
날개다랑이 釣獲率
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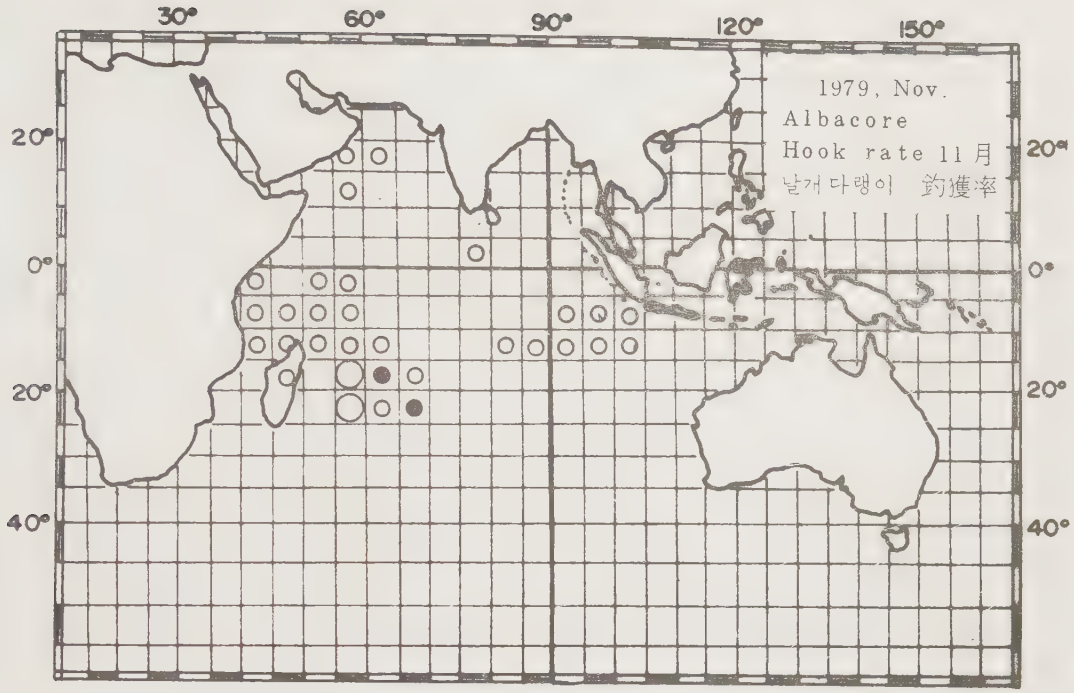
60°
90°
120°
150°


30°
60°
90°
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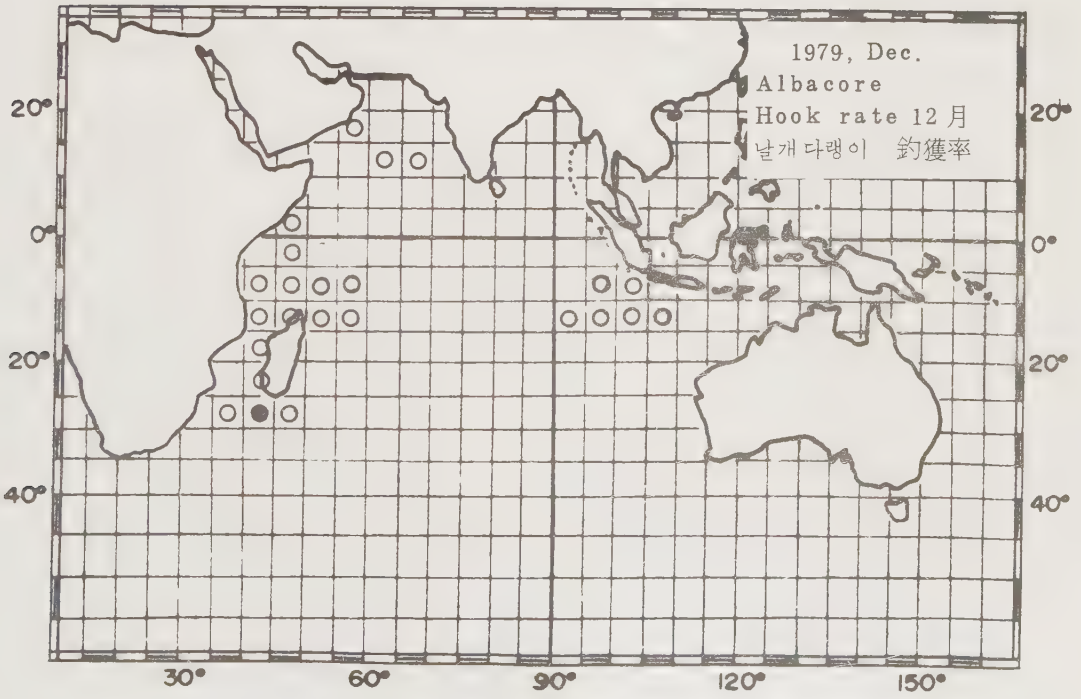
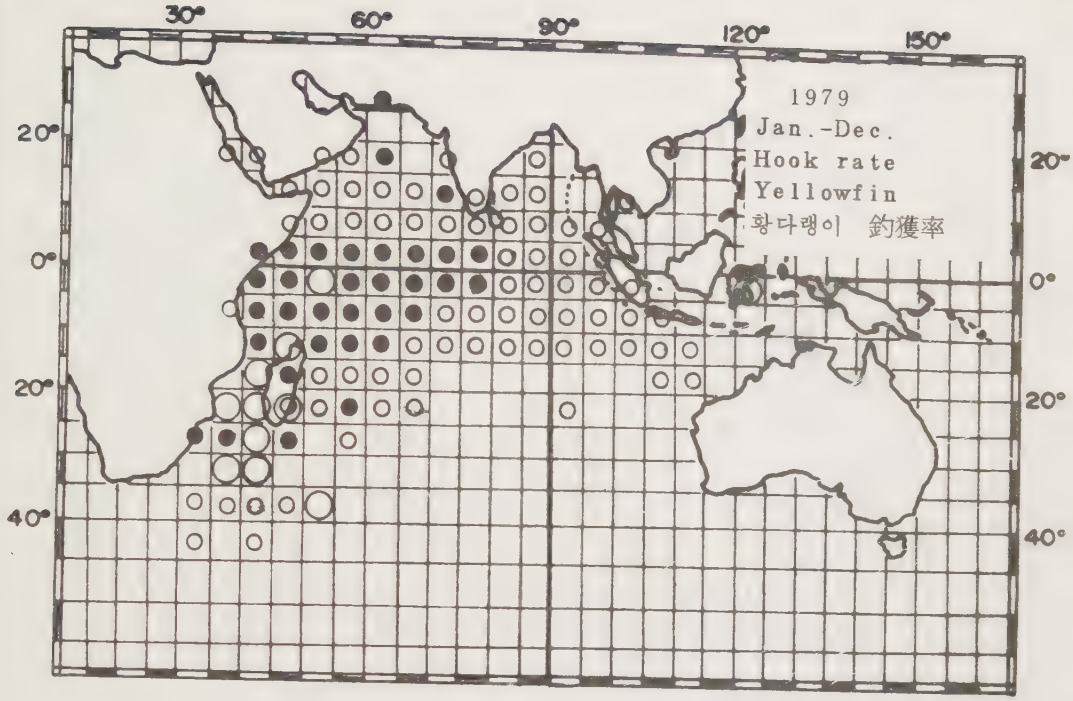
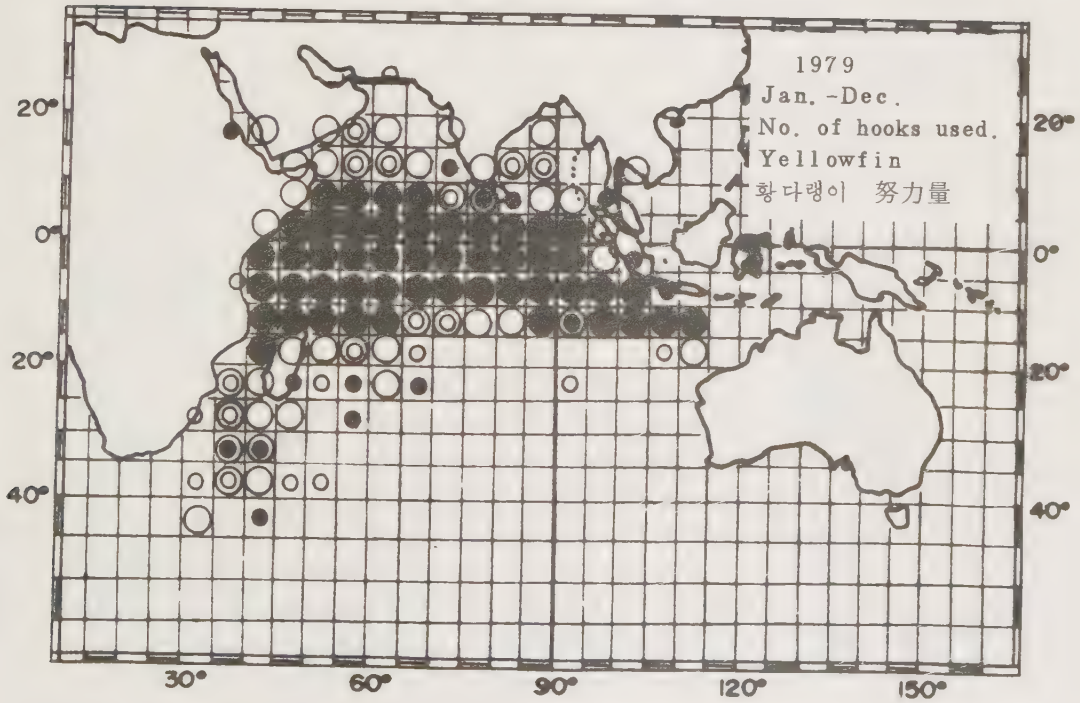
20°
40°
1979, Nov.
Albacore
Hook rate 11月
날개다랑이 釣獲率

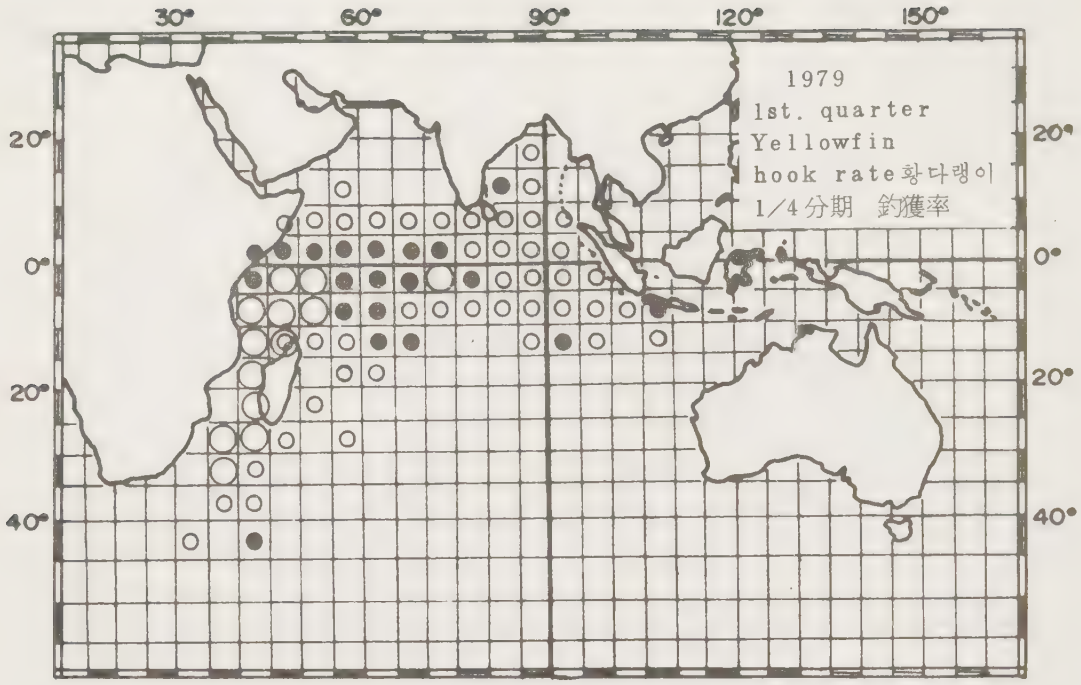

1979, Dec.
Albacore
Hook rate 12月
날개다랑이 釣獲率
20°
0°
20°
40°
30°
60°
90°
120°
150°

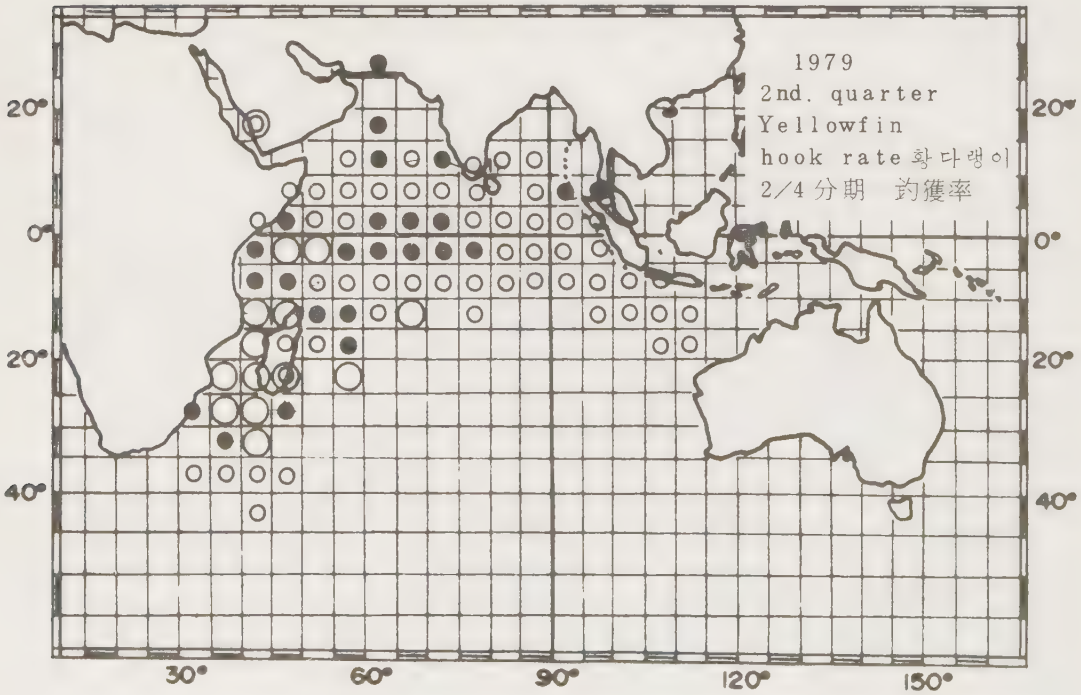
황 다 랭 이

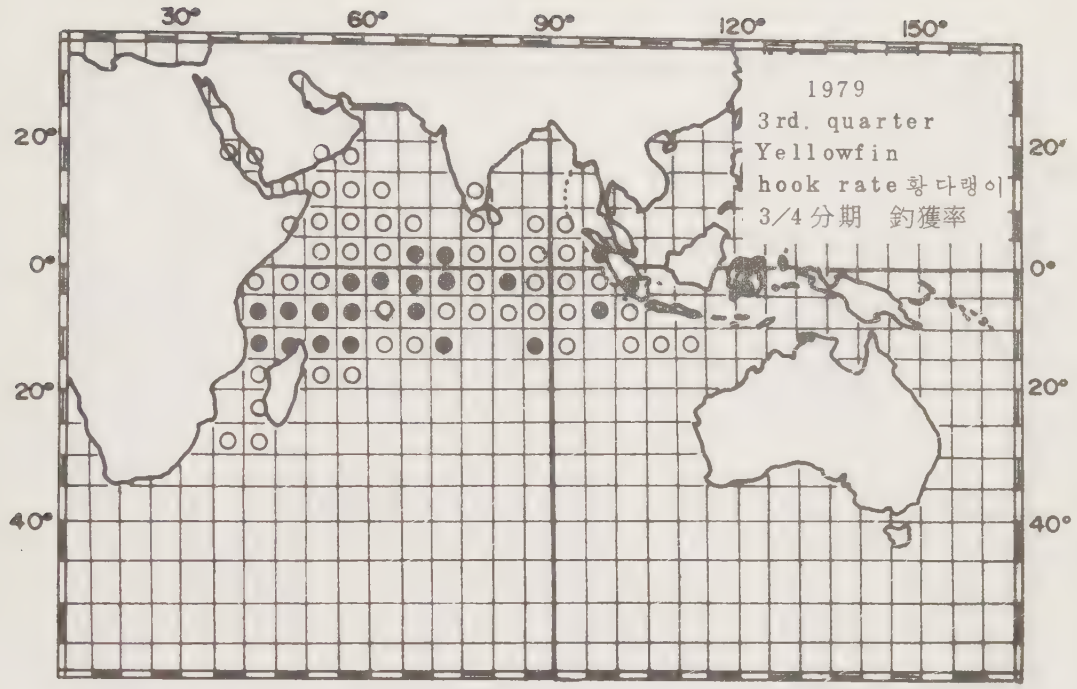
Yellowfin

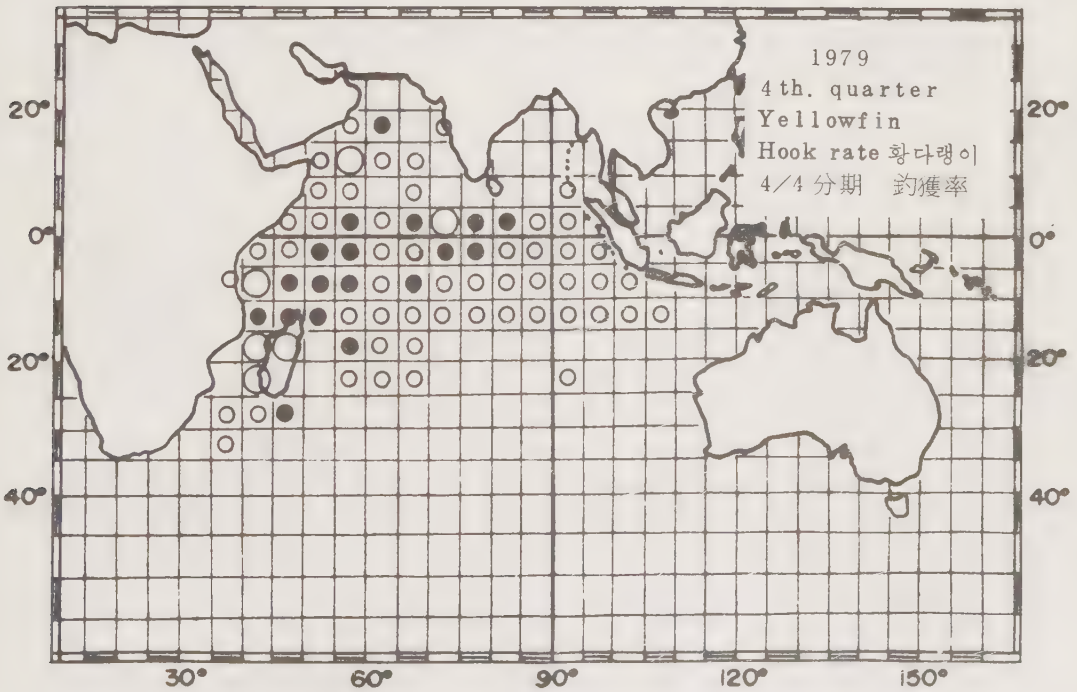

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
Jan.-Dec.
Hook rate
Yellowfin
황다랭이 釣獲率

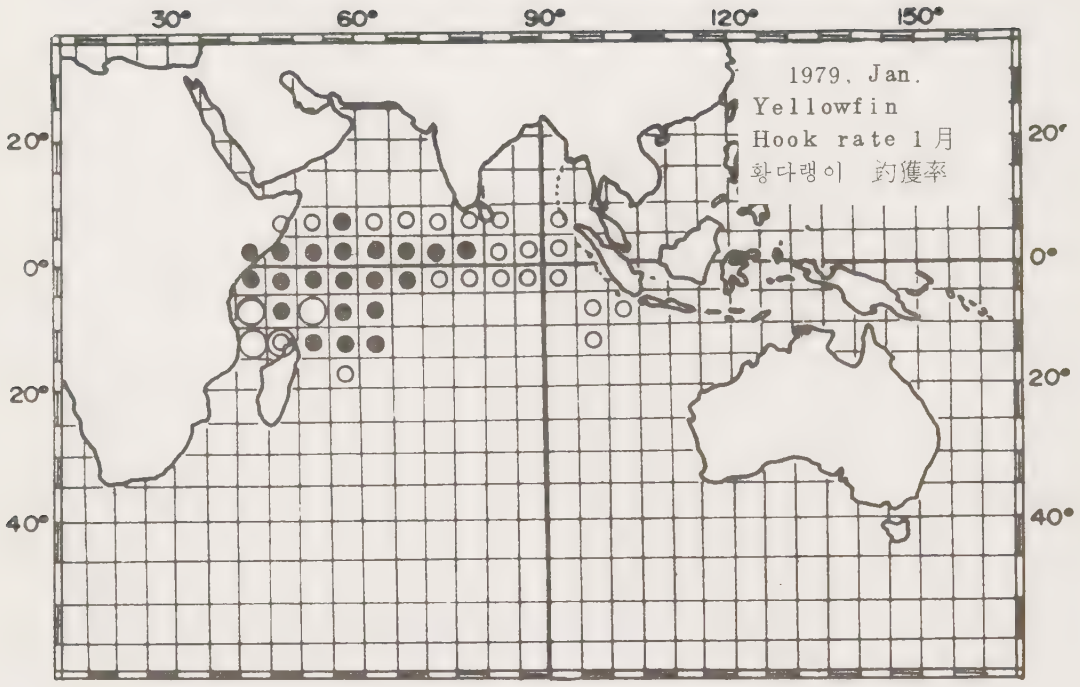

1979
Jan.-Dec.
No. of hooks used.
Yellowfin
황다랭이 努力量
20°
0°
20°
40°
30°
60°
90°
120°
150°

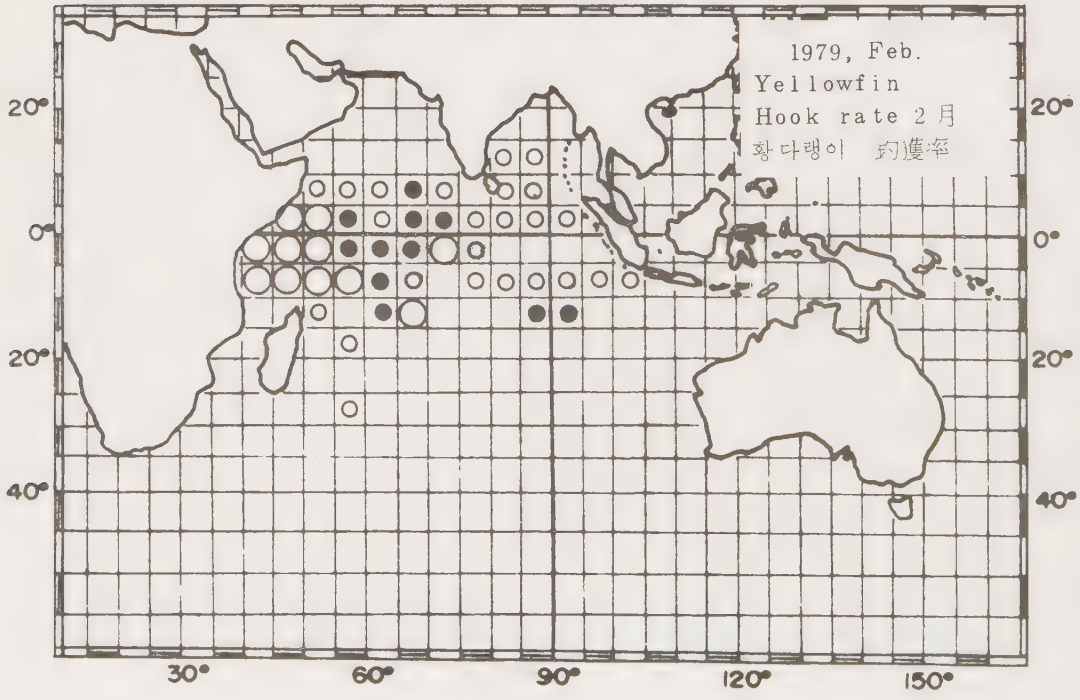

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
1st. quarter
Yellowfin
hook rate황다랑이
1/4分期 釣獲率

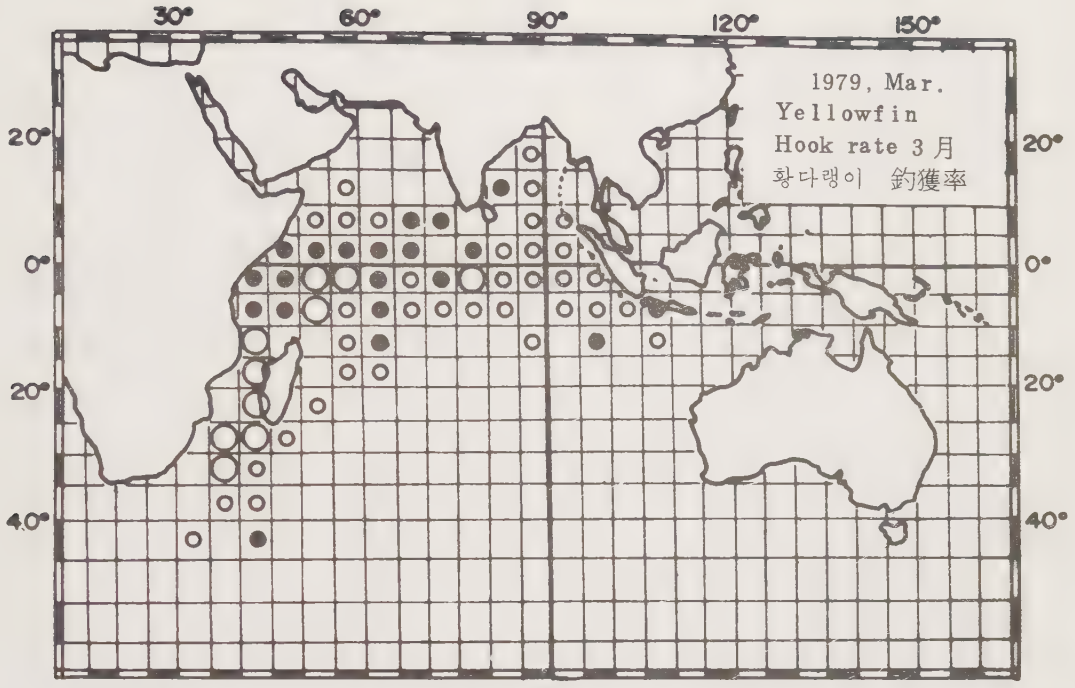

20°
0°
20°
40°
1979
2nd. quarter
Yellowfin
hook rate황다랑이
2/4分期 釣獲率
30°
60°
90°
120°
150°

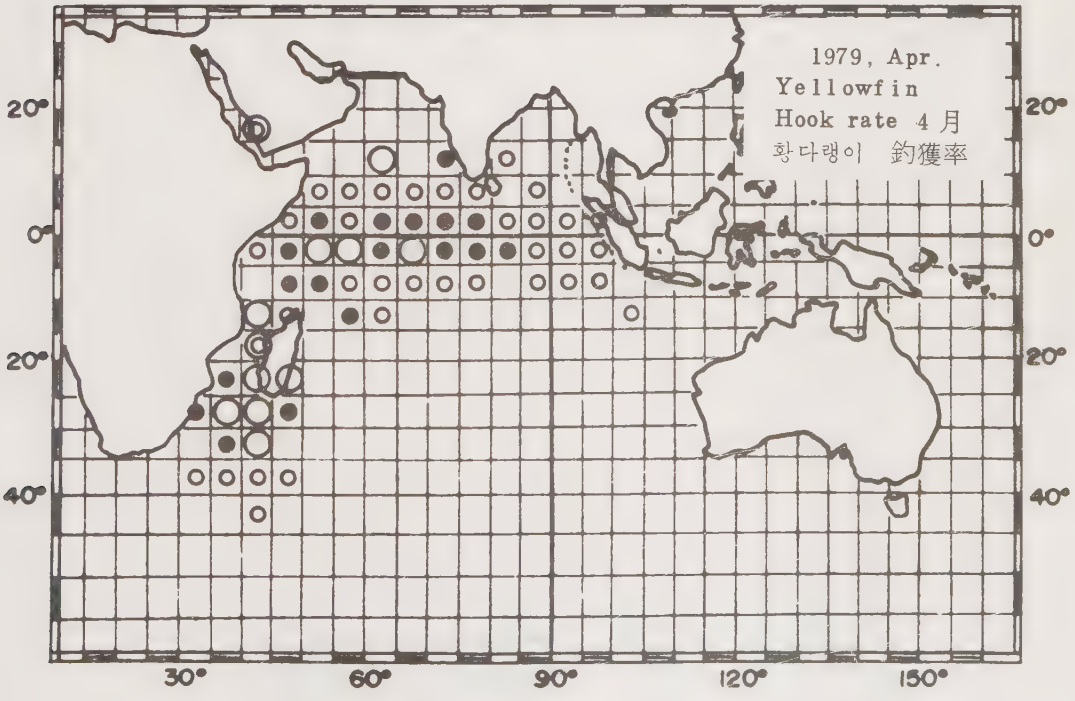

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
3rd. quarter
Yellowfin
hook rate 황다랑이
3/4 分期 釣獲率

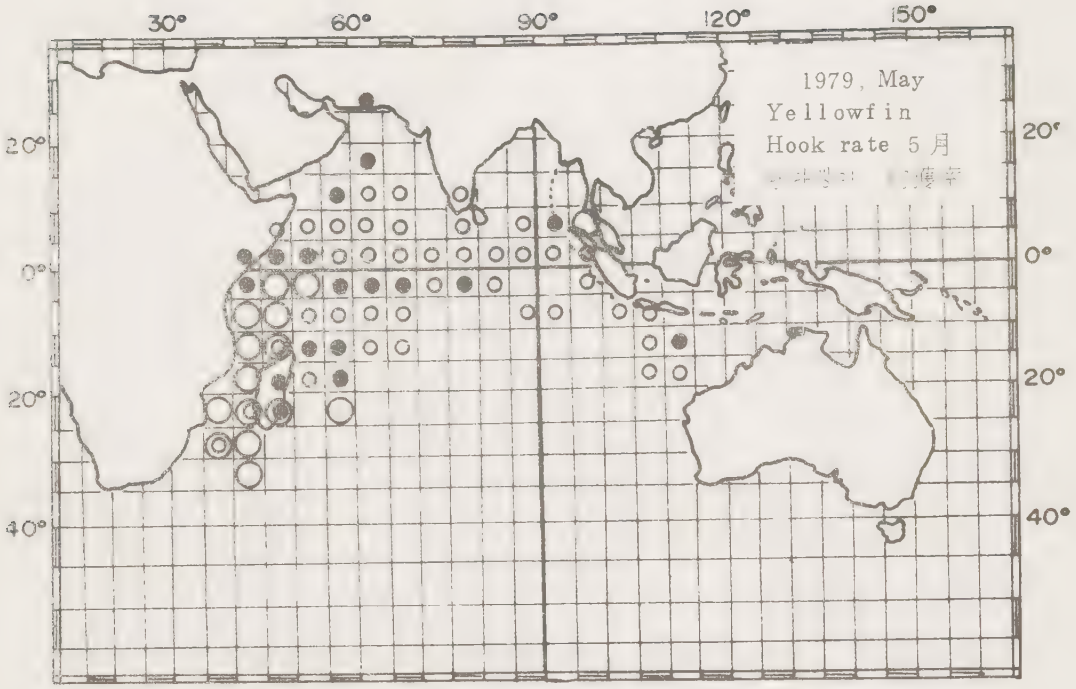

1979
4th. quarter
Yellowfin
Hook rate 황다랑이
4/4 分期 釣獲率
20°
0°
20°
40°
30°
60°
90°
120°
150°

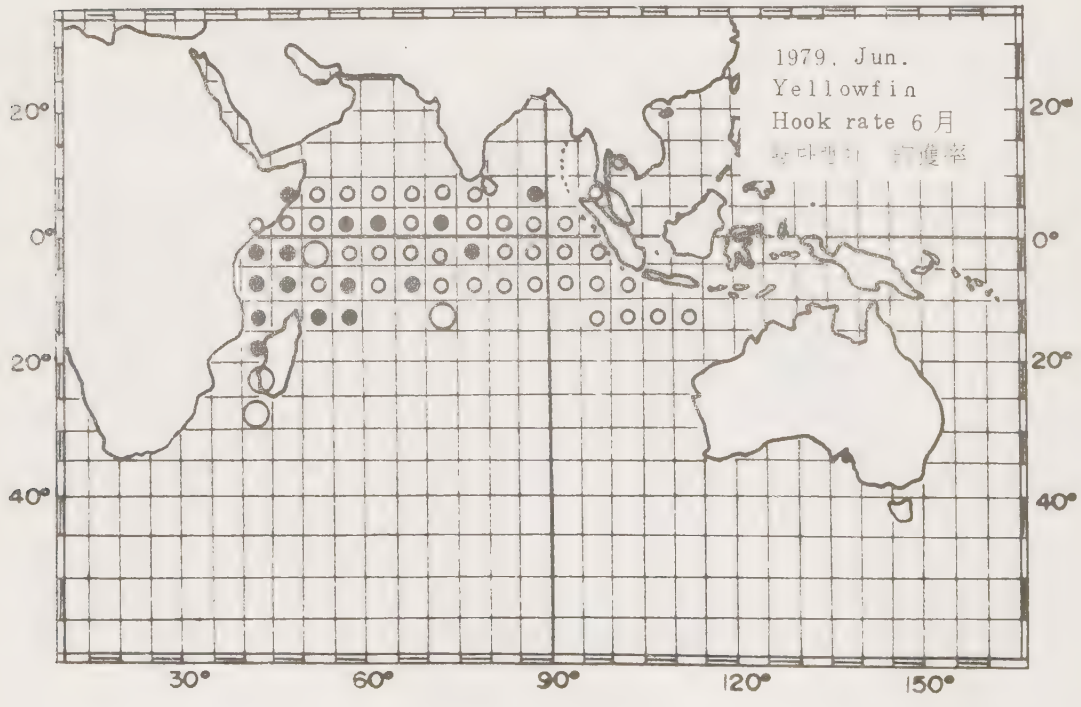

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Jan.
Yellowfin
Hook rate 1月
황다랑이 釣獲率

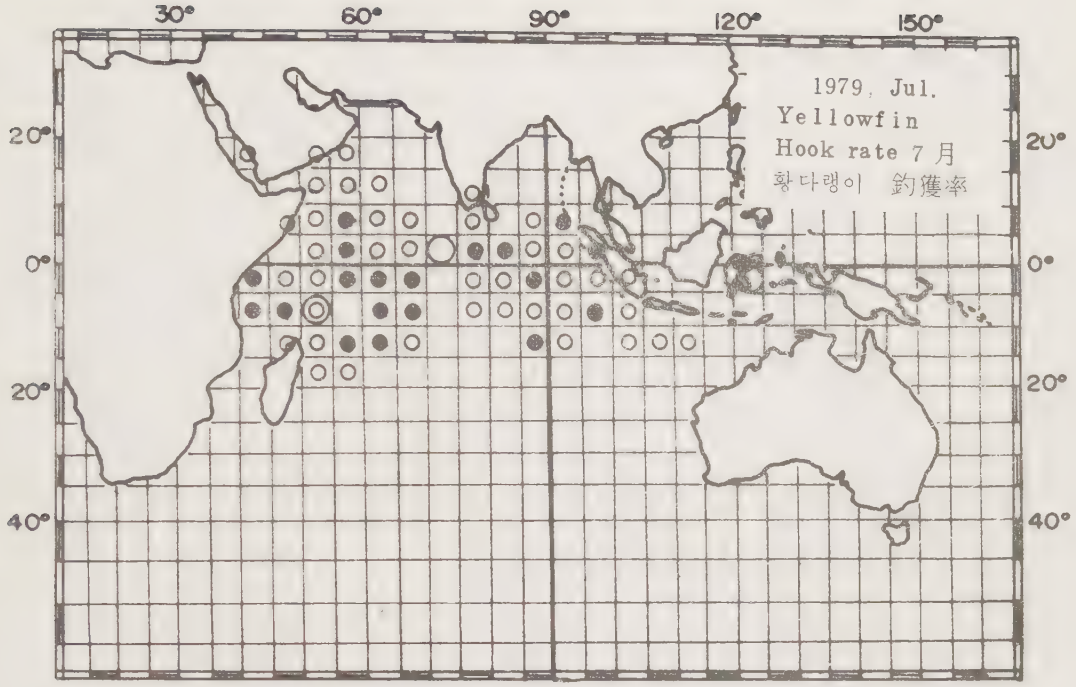

1979, Feb.
Yellowfin
Hook rate 2月
황다랑이 釣獲率
20°
0°
20°
40°
30°
60°
90°
120°
150°


30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Mar.
Yellowfin
Hook rate 3月
황다랑이 釣獲率


1979, Apr.
Yellowfin
Hook rate 4月
황다랑이 釣獲率
20°
0°
20°
40°
30°
60°
90°
120°
150°


30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, May
Yellowfin
Hook rate 5月


20°
0°
20°
40°
1979, Jun.
Yellowfin
Hook rate 6月
30°
60°
90°
120°
150°


30°
60°
90°
120°
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20°
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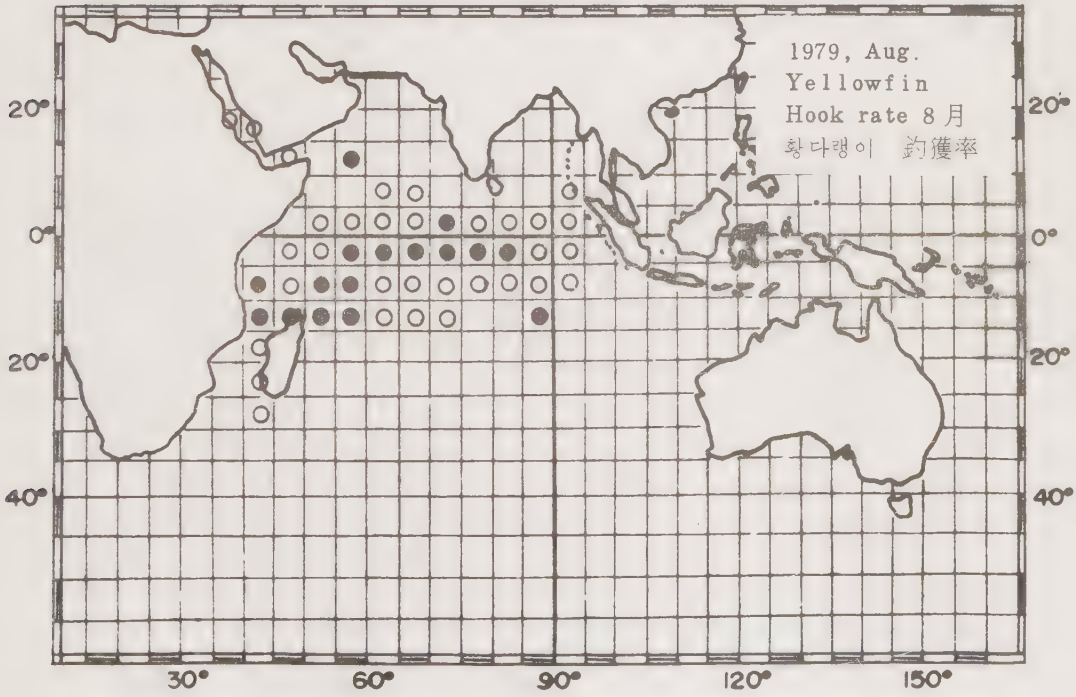
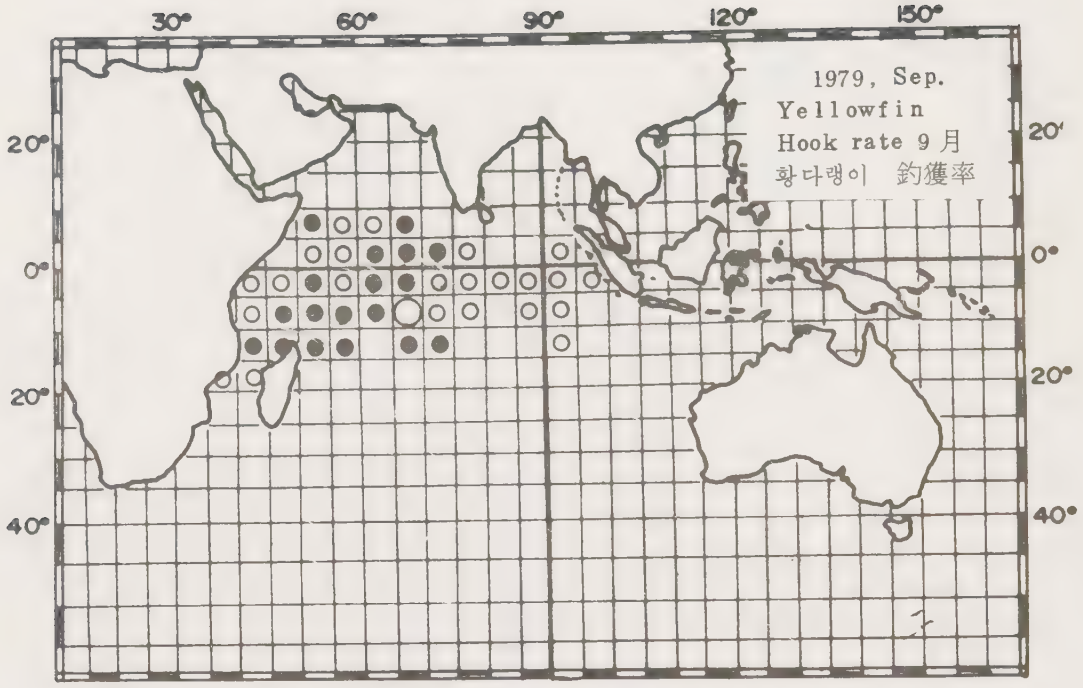
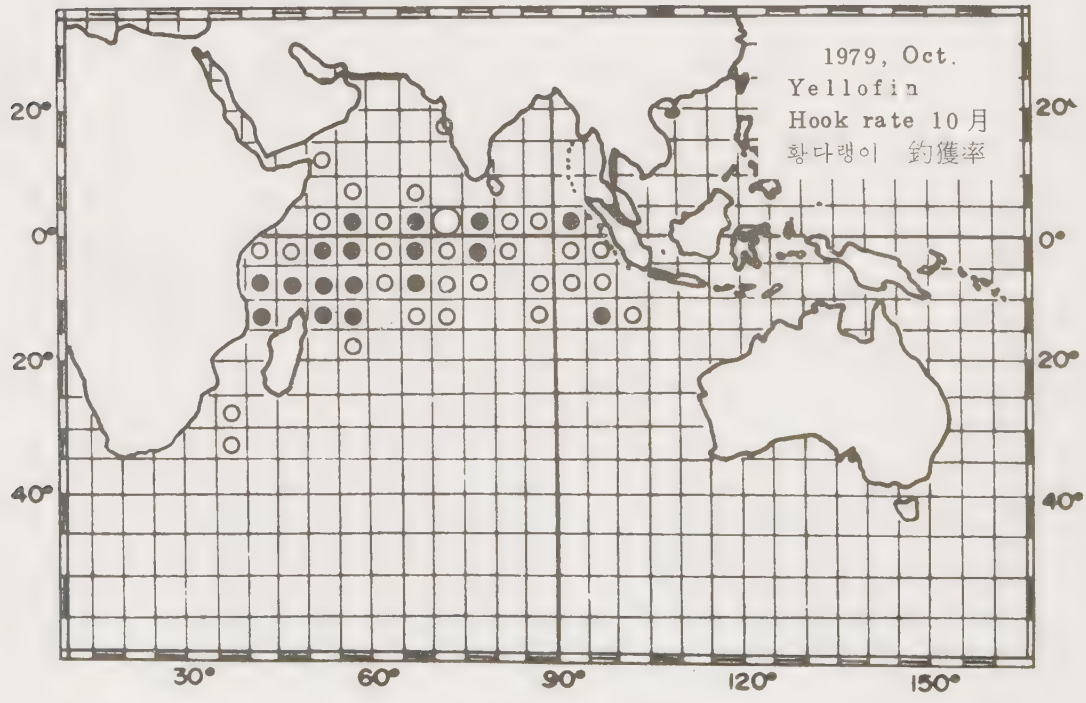
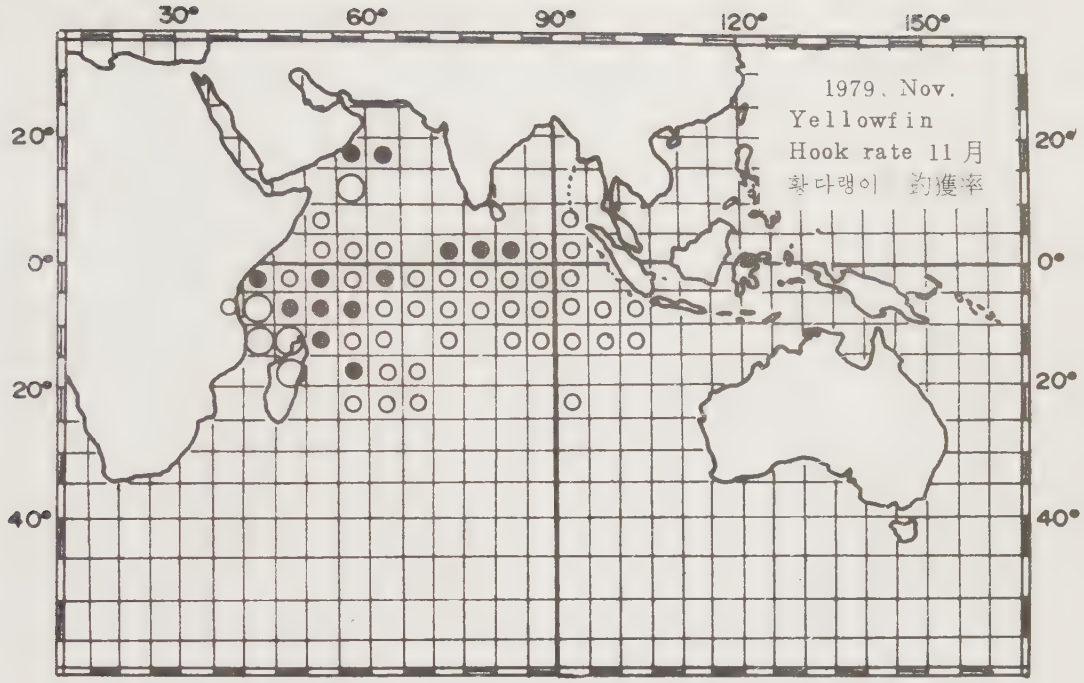
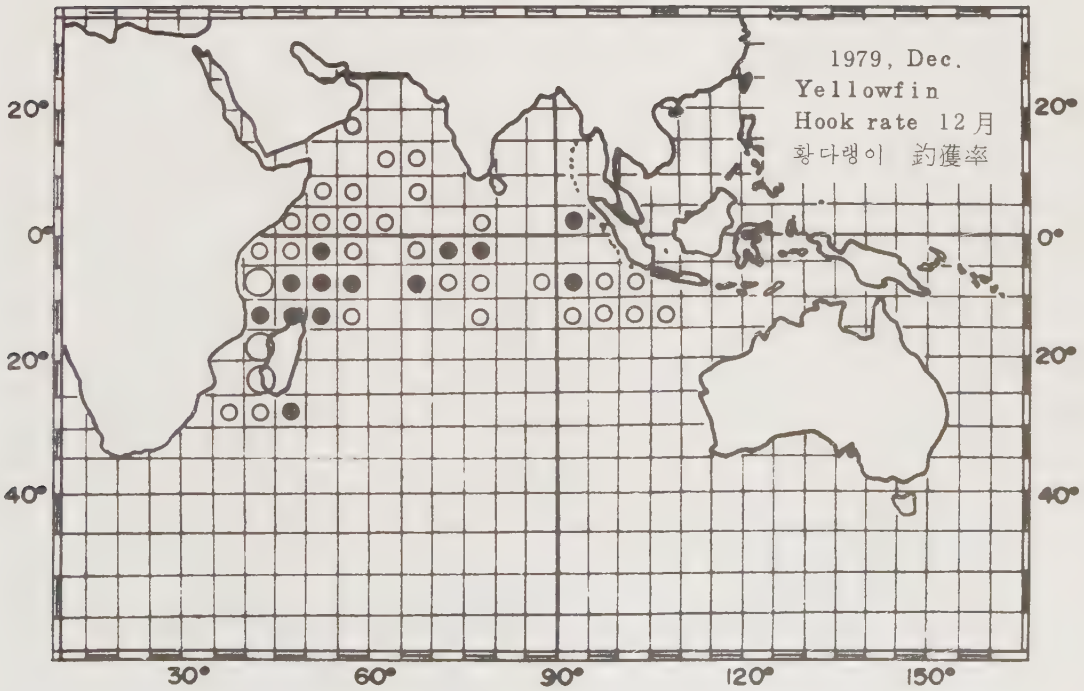
20°
40°
1979, Jul.
Yellowfin
Hook rate 7月
황다랑이 釣獲率

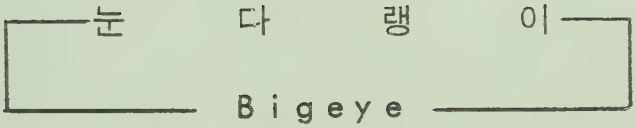

20°
0°
20°
40°
1979, Aug.
Yellowfin
Hook rate 8月
황다랑이 釣獲率
30°
60°
90°
120°
150°

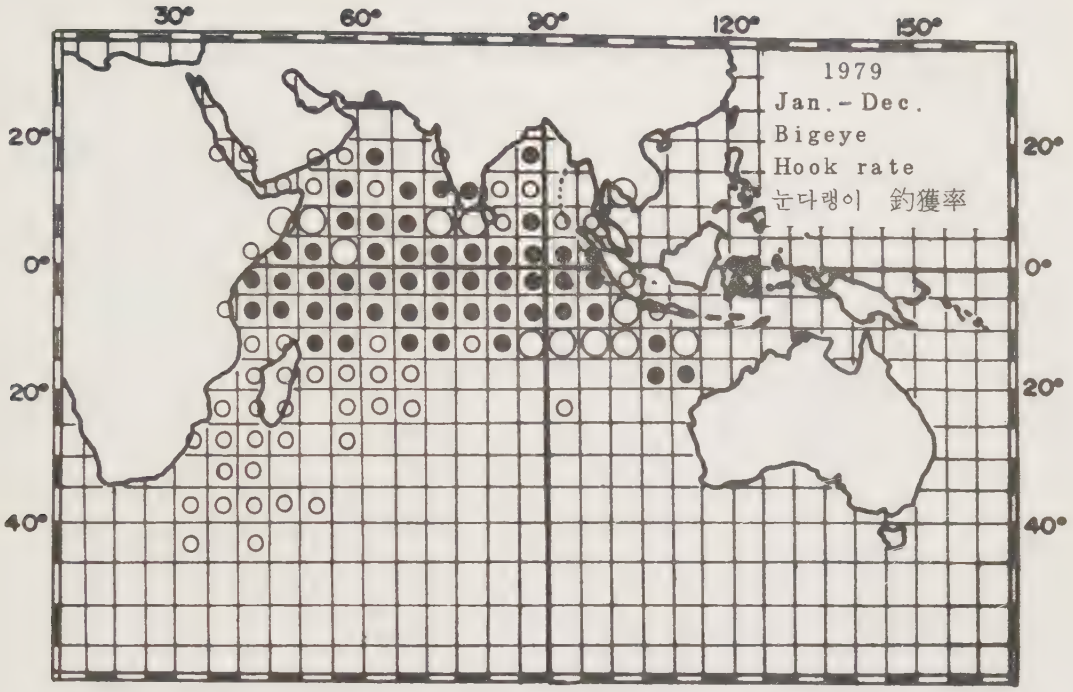

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Sep.
Yellowfin
Hook rate 9月
황다랭이 釣獲率

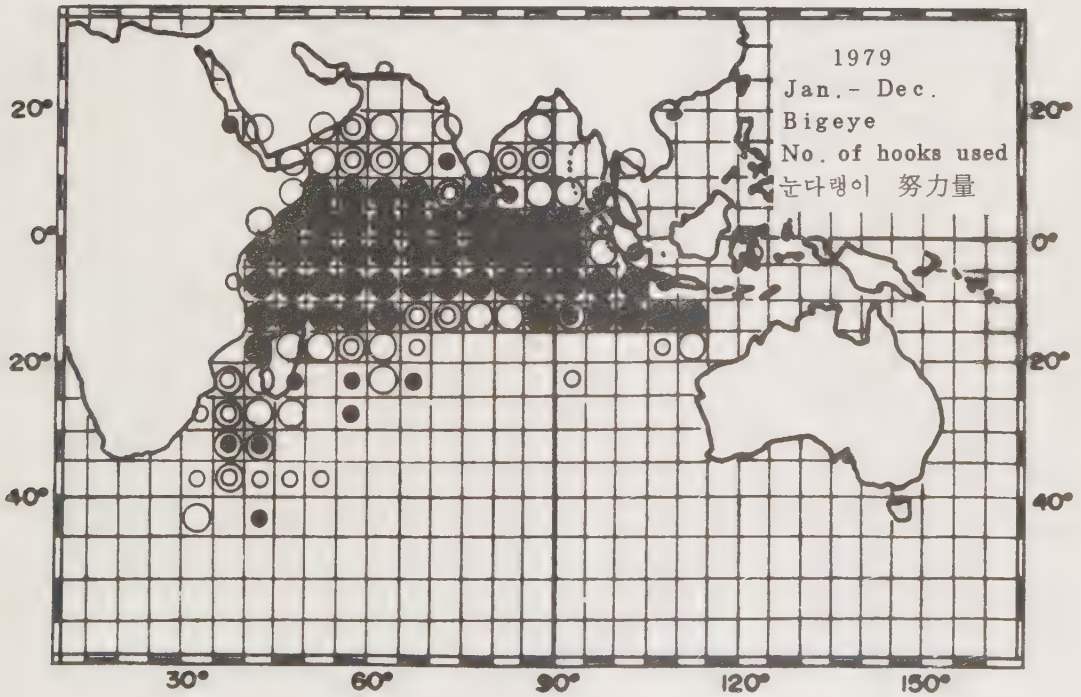

1979, Oct.
Yellofin
Hook rate 10月
황다랭이 釣獲率
20°
0°
20°
40°
30°
60°
90°
120°
150°

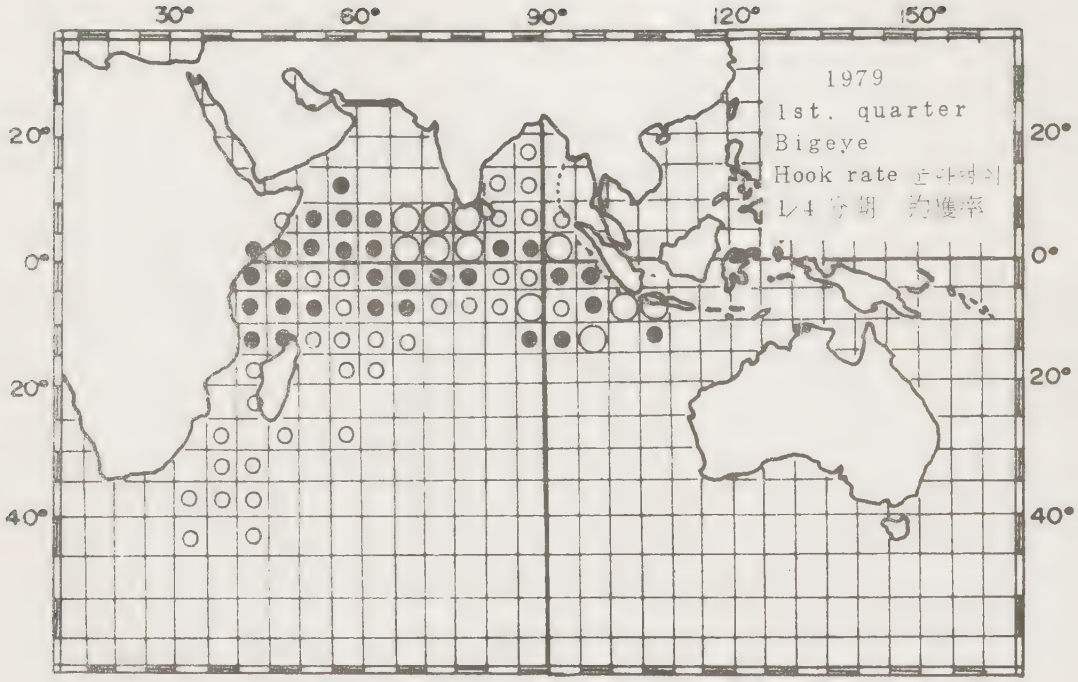

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979. Nov.
Yellowfin
Hook rate 11月
황다랭이 釣獲率

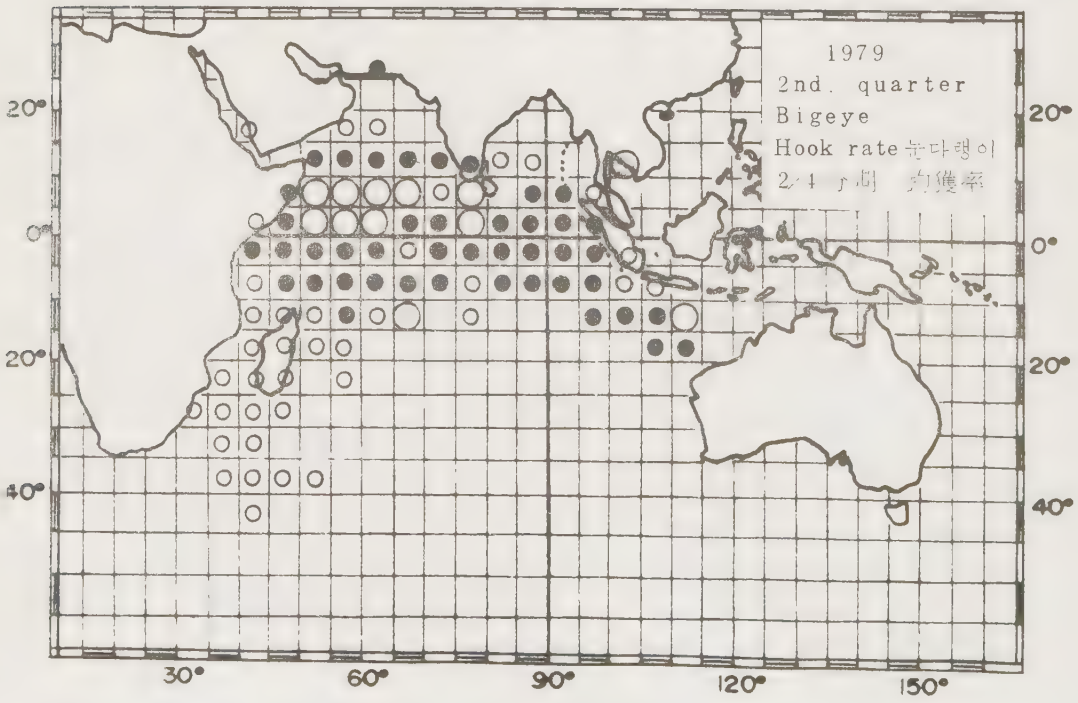

20°
0°
20°
40°
1979, Dec.
Yellowfin
Hook rate 12月
황다랭이 釣獲率
30°
60°
90°
120°
150°

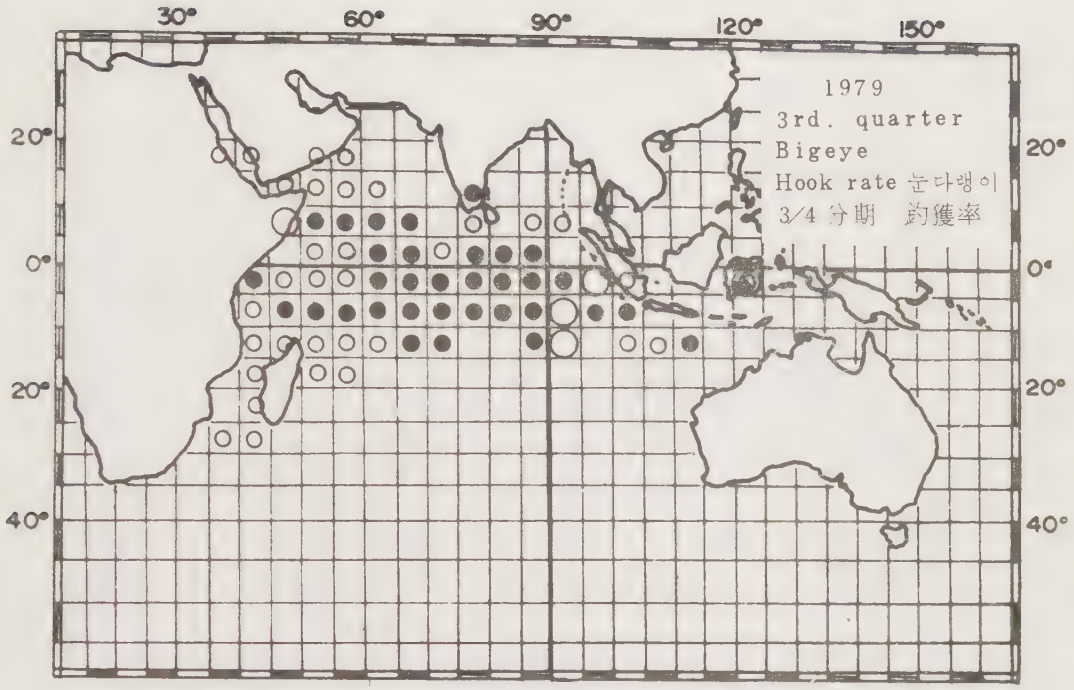

눈 다 랭 이
Bigeye

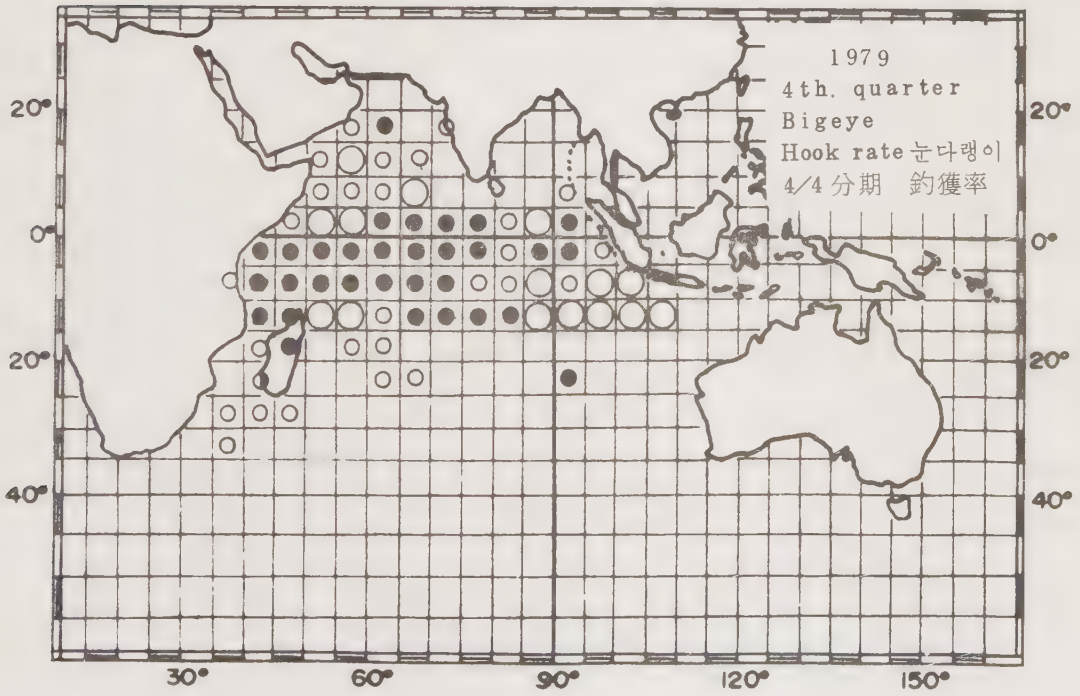

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
Jan.- Dec.
Bigeye
Hook rate
눈다랑이 釣獲率

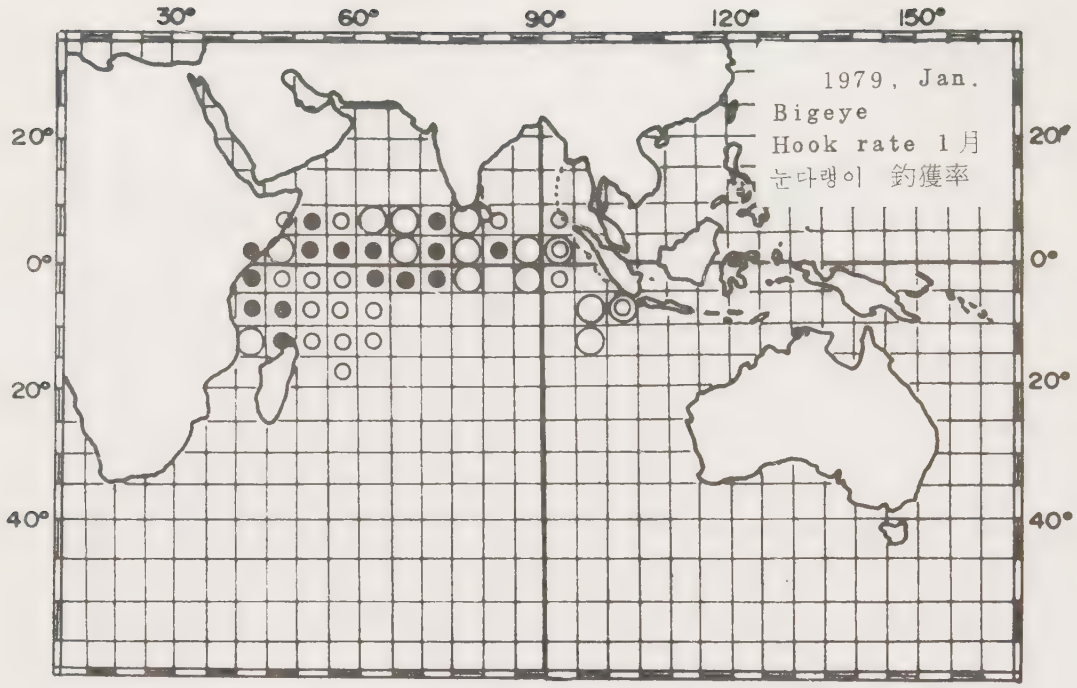

1979
Jan.- Dec.
Bigeye
No. of hooks used
눈다랑이 努力量
20°
0°
20°
40°
30°
60°
90°
120°
150°

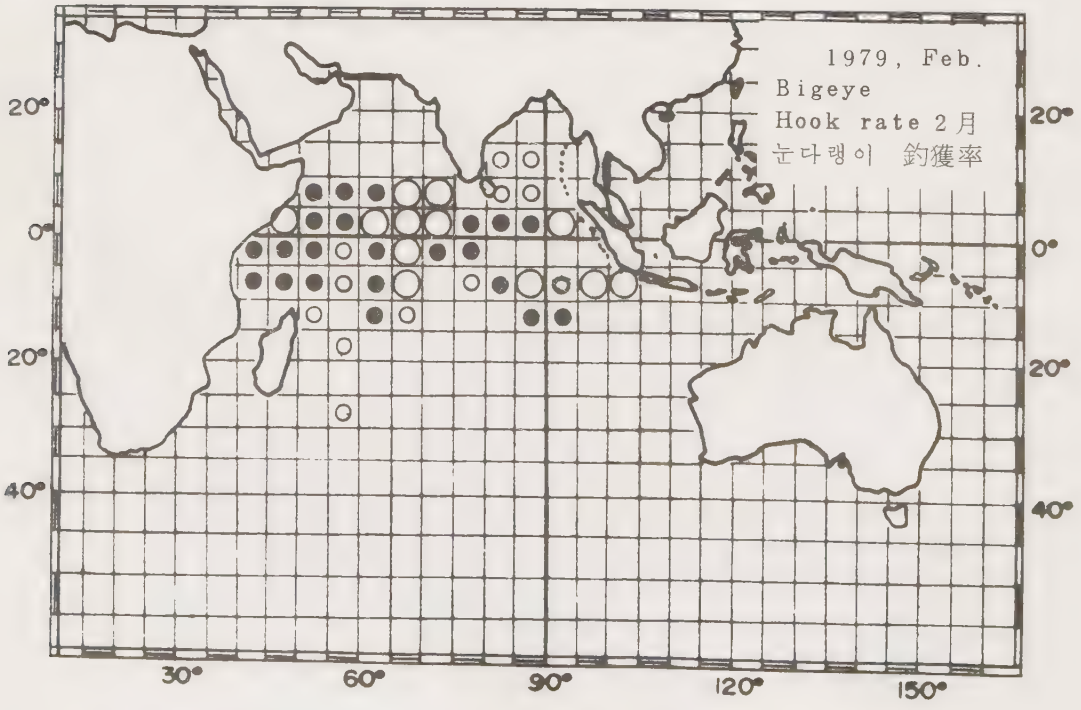

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
1st. quarter
Bigeye
Hook rate 눈다랑이
1/4 分期 約獲率

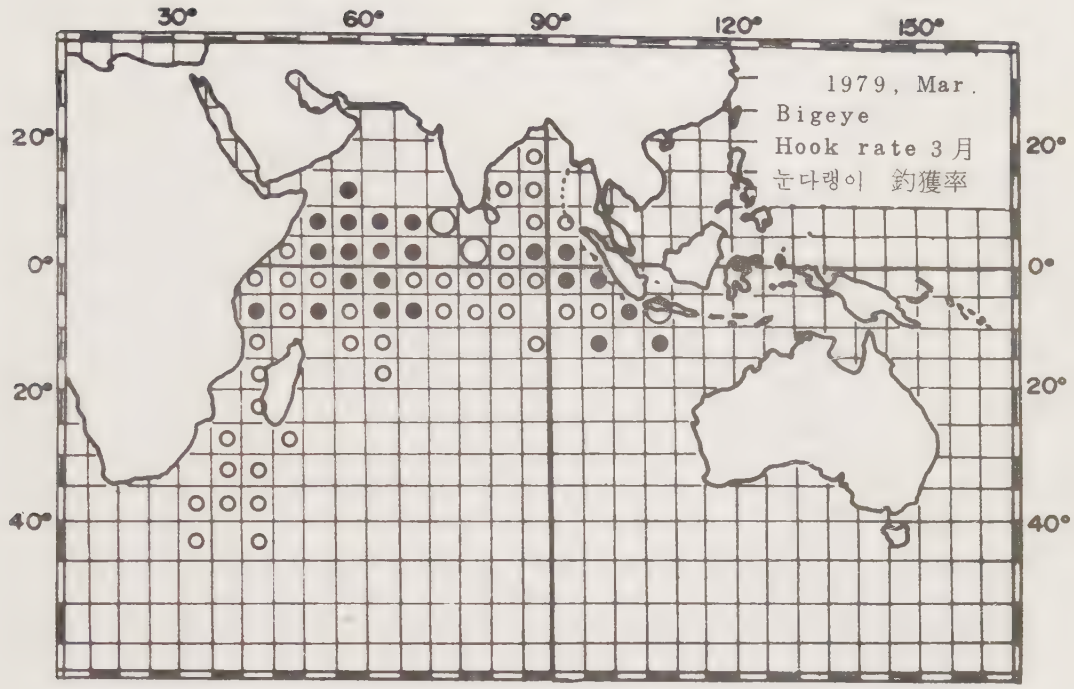

1979
2nd. quarter
Bigeye
Hook rate 눈다랑이
2/4 分期 約獲率
20°
0°
20°
40°
30°
60°
90°
120°
150°

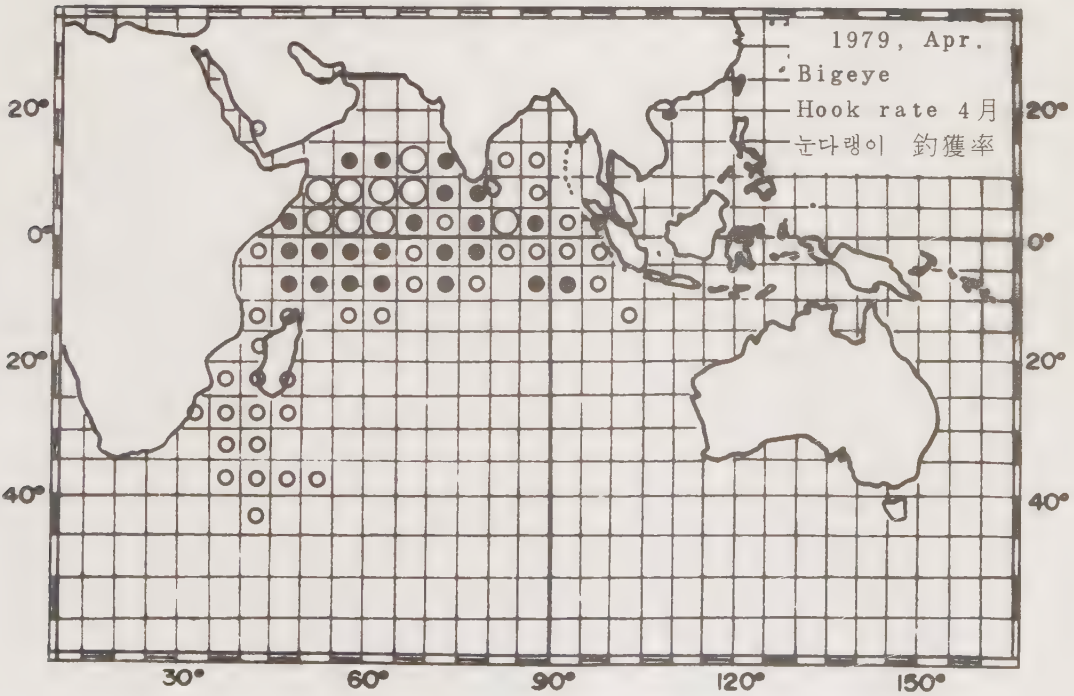

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
3rd. quarter
Bigeye
Hook rate 눈다랑이
3/4 分期 釣獲率

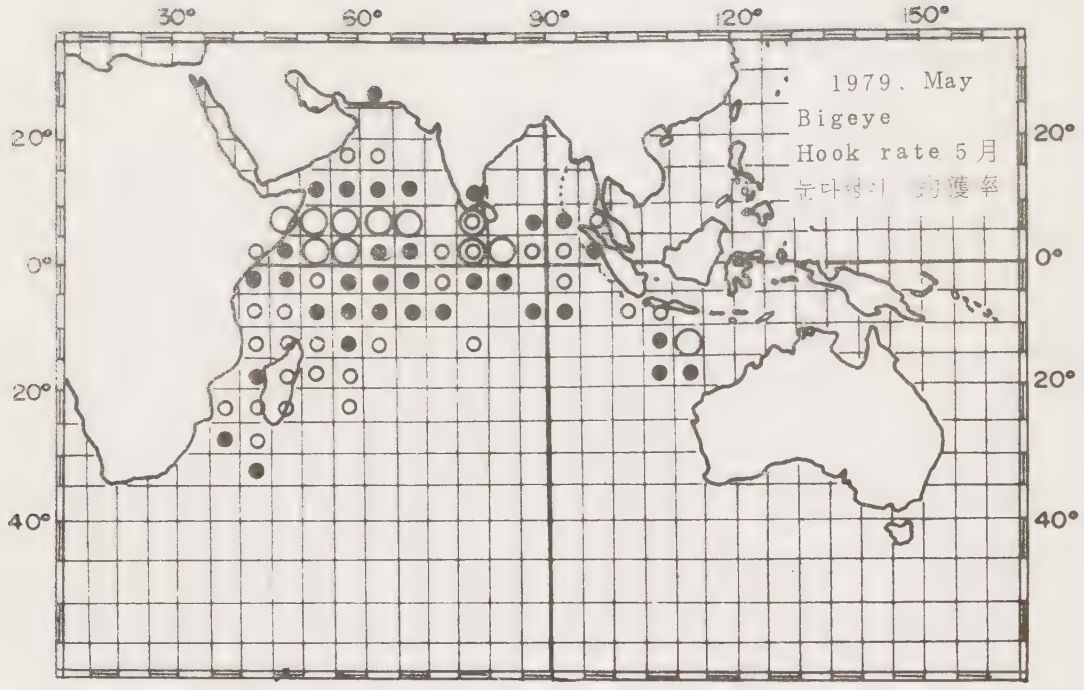

30°
60°
90°
120°
150°
20°
0°
20°
40°
1979
4th. quarter
Bigeye
Hook rate 눈다랑이
4/4 分期 釣獲率


30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Jan.
Bigeye
Hook rate 1月
눈다랑이 釣獲率


20°
0°
20°
40°
1979, Feb.
Bigeye
Hook rate 2月
눈다랑이 釣獲率
30°
60°
90°
120°
150°


30°
60°
90°
120°
150°
20°
0°
20°
40°
1979, Mar.
Bigeye
Hook rate 3月
눈다랑이 釣獲率


20°
0°
20°
40°
1979, Apr.
Bigeye
Hook rate 4月
눈다랑이 釣獲率
30°
60°
90°
120°
150°


30°
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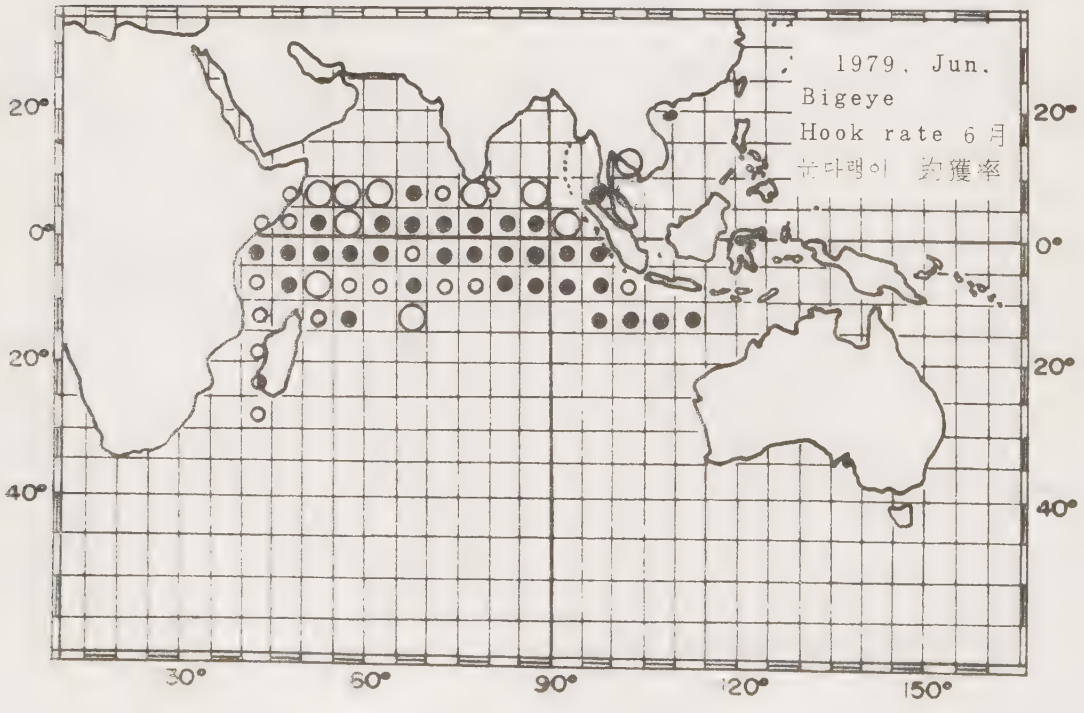
1979. May
Bigeye
Hook rate 5月
눈다랑이 釣獲率


20°
0°
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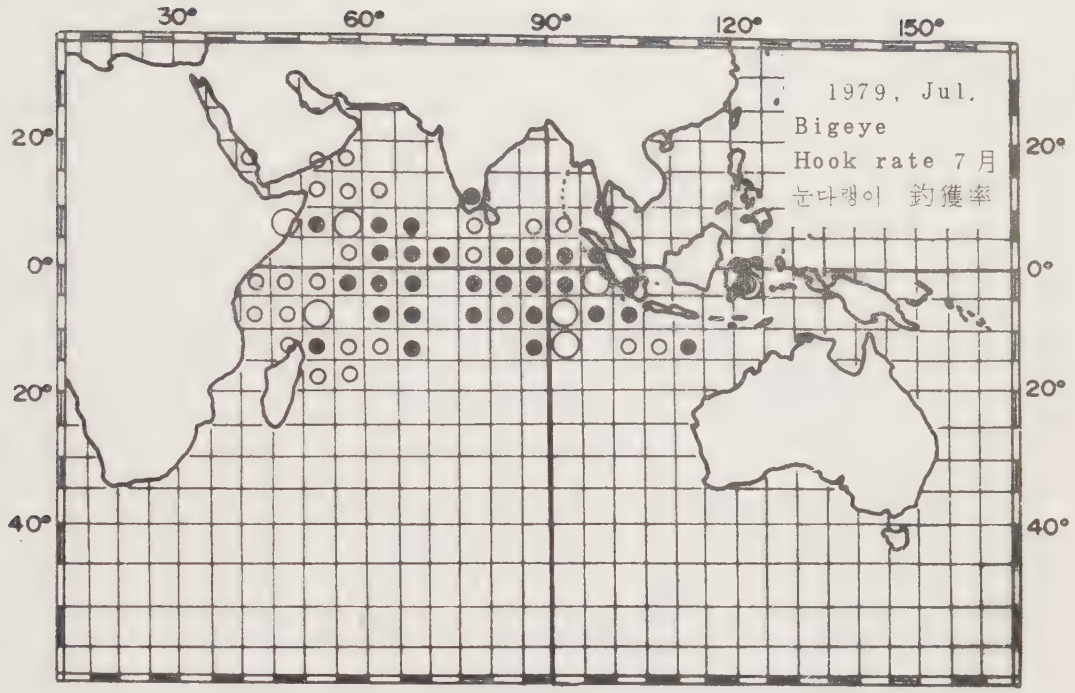
1979. Jun.
Bigeye
Hook rate 6月
눈다랑이 釣獲率
30°
60°
90°
120°
150°


30°
60°
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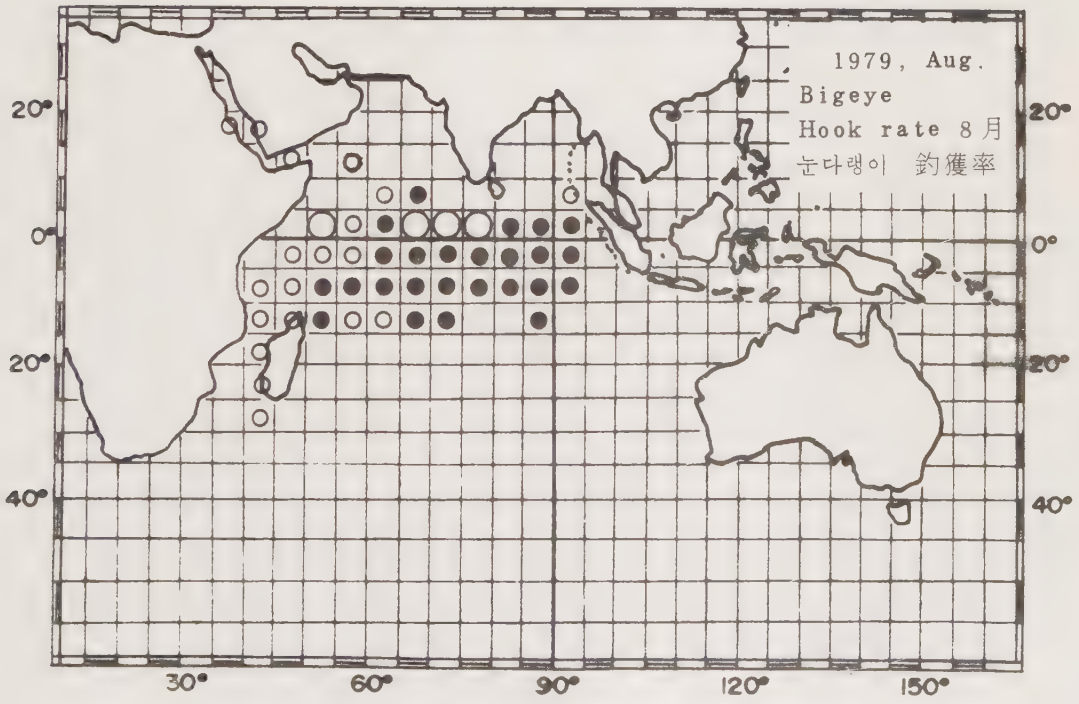
1979, Jul.
Bigeye
Hook rate 7月
눈다랑이 釣獲率


20°
0°
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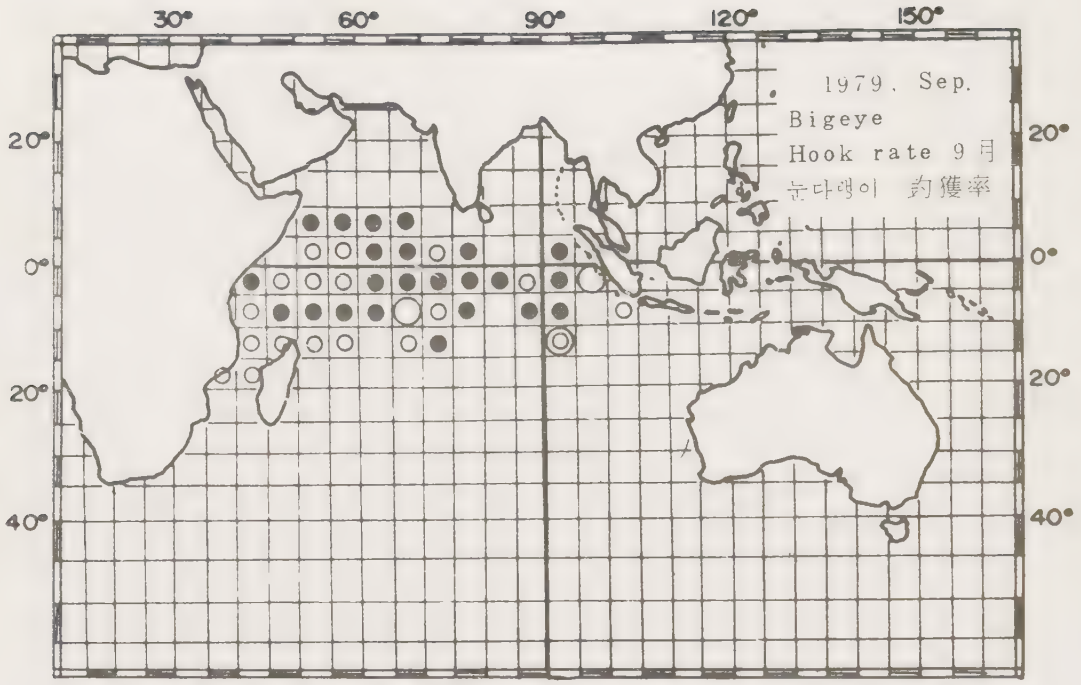
40°
1979, Aug.
Bigeye
Hook rate 8月
눈다랑이 釣獲率
30°
60°
90°
120°
150°


30°
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120°
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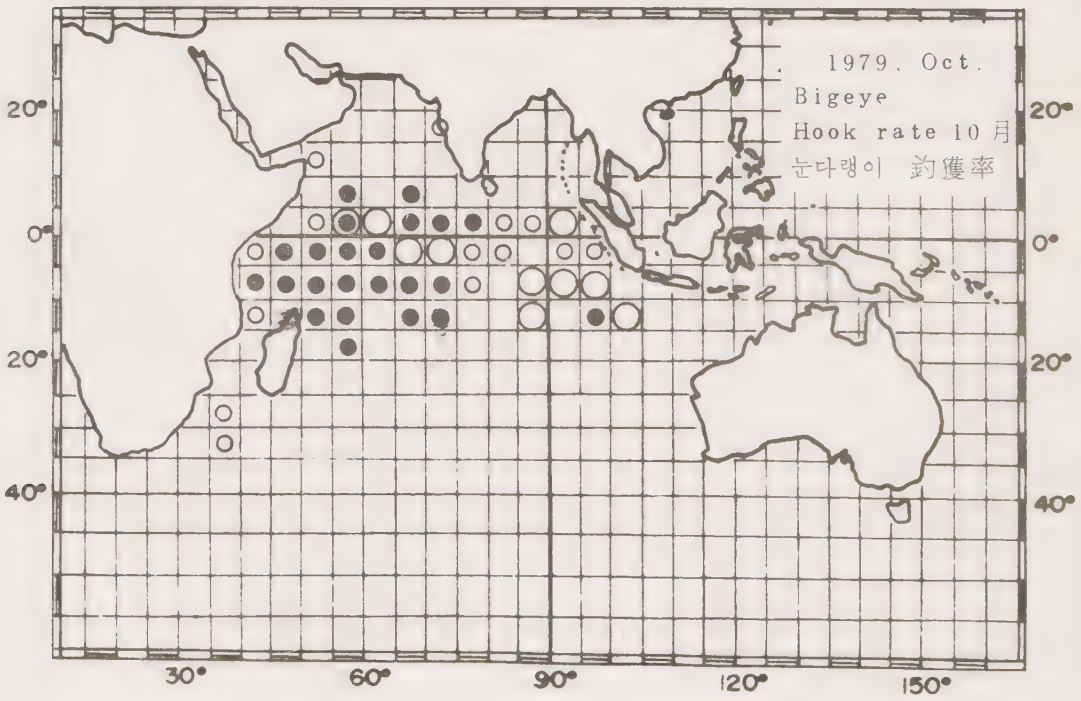
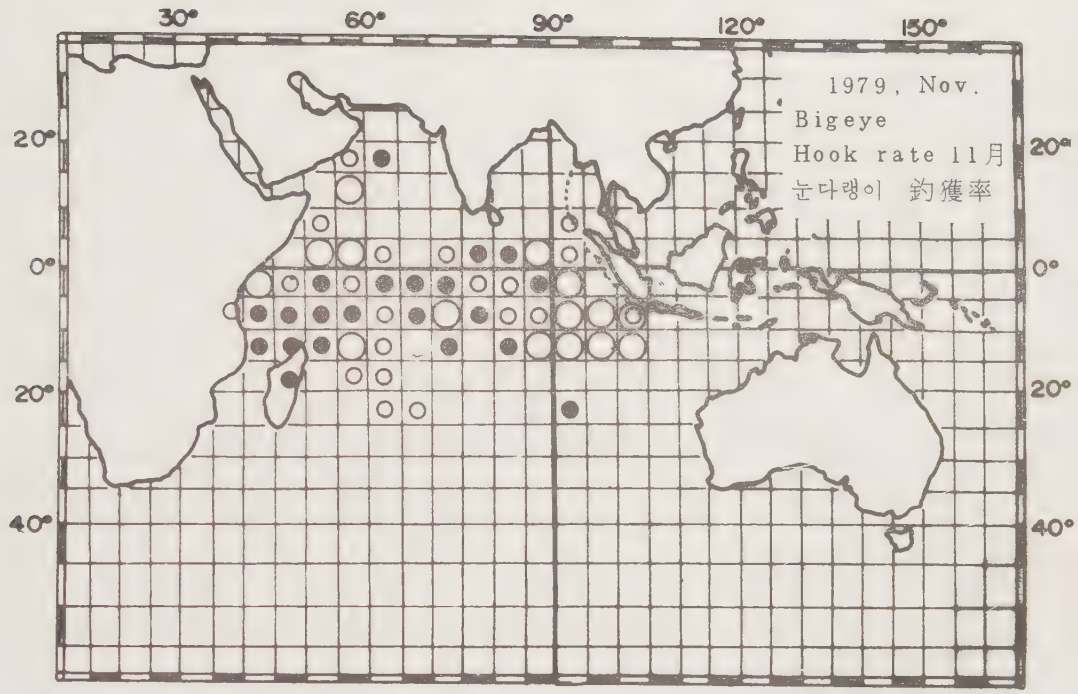
1979. Sep.
Bigeye
Hook rate 9月
눈다랑이 釣獲率


20°
0°
20°
40°
1979. Oct.
Bigeye
Hook rate 10月
눈다랑이 釣獲率
30°
60°
90°
120°
150°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60°
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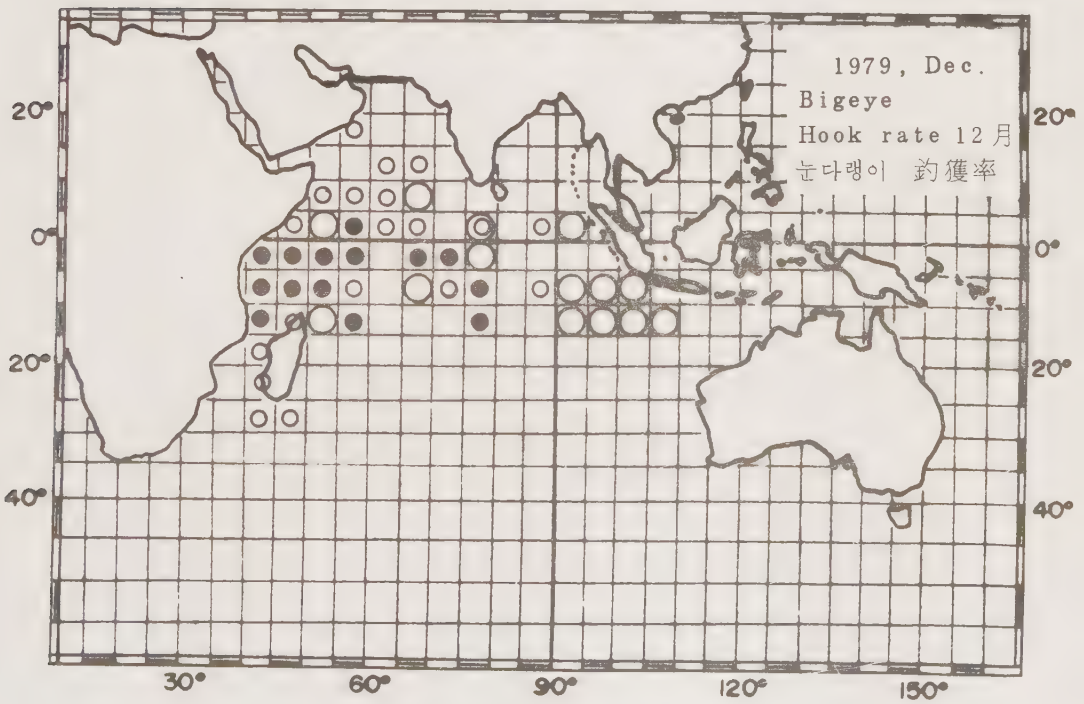
40°
1979, Nov.
Bigeye
Hook rate 11月
눈다랑이 釣獲率


20°
0°
20°
40°
1979, Dec.
Bigeye
Hook rate 12月
눈다랑이 釣獲率
30°
60°
90°
120°
150°

太　　平　　洋
Pacific Ocean

1. 全魚種의 分期別 月別 釣獲率 및 努力量 分布図

Distribution of hook rate and fishing effort of all species by month and by quarter

2. 魚種別 分期別 月別 釣獲率 및 努力量 分布図
날개다랑이, 황다랑이, 눈다랑이

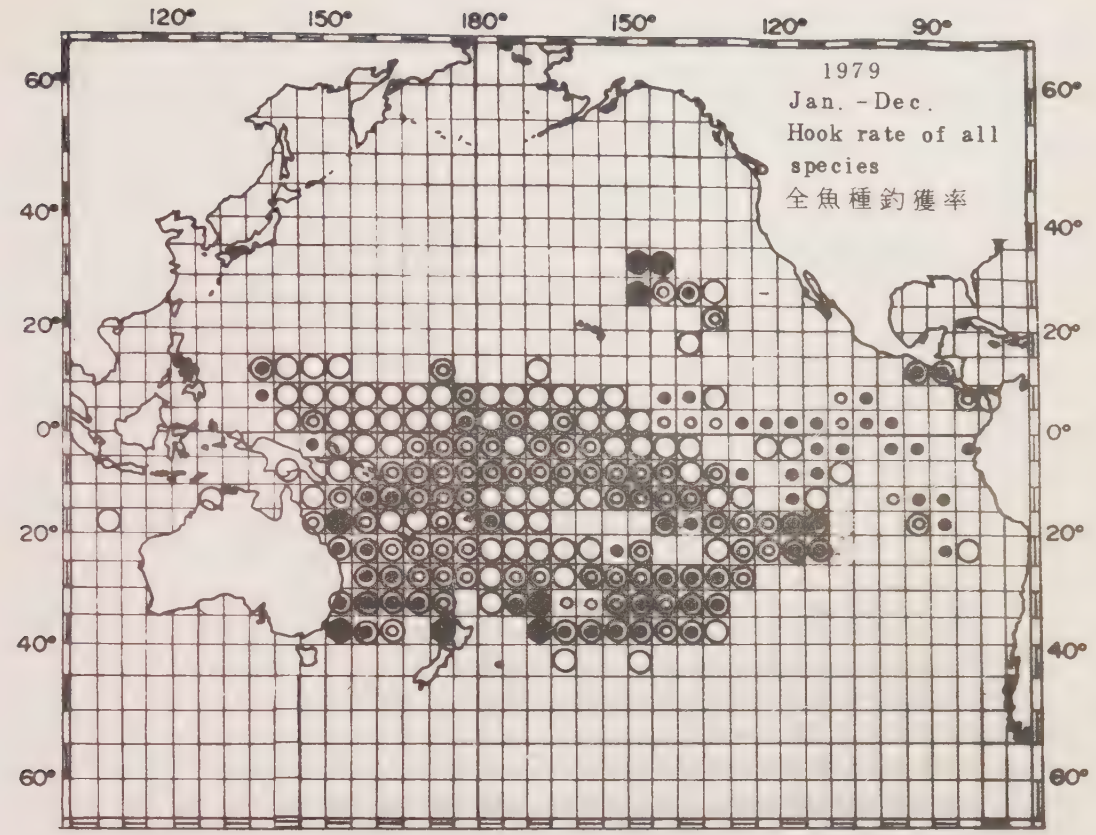
Distribution of hook rate and fishing effort by species by month and by quarter
Albacore, Yellowfin, Bigeye

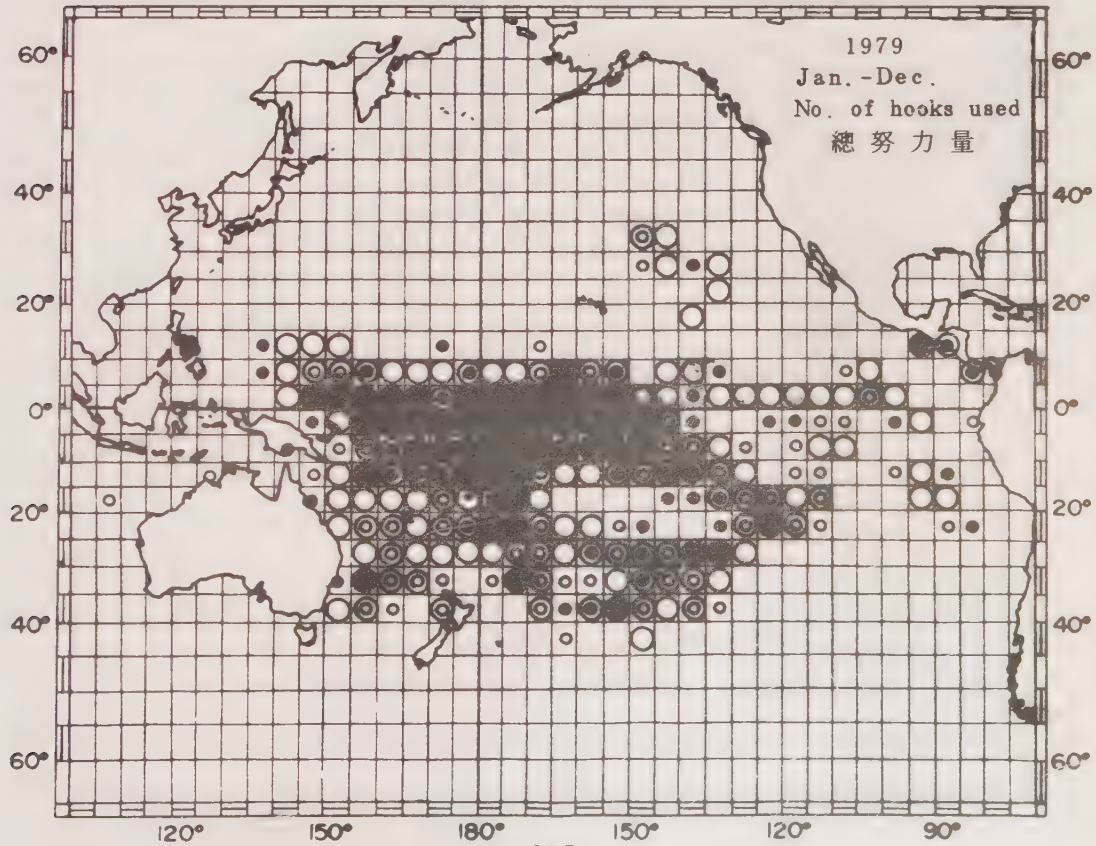
全　魚　種

分期別 月別 釣獲率 및 漁獲努力 分布圖

All species

Hook rate and fishing effort by month and by quarter


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
Jan. - Dec.
Hook rate of all species
全魚種釣獲率


120°
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180°
150°
120°
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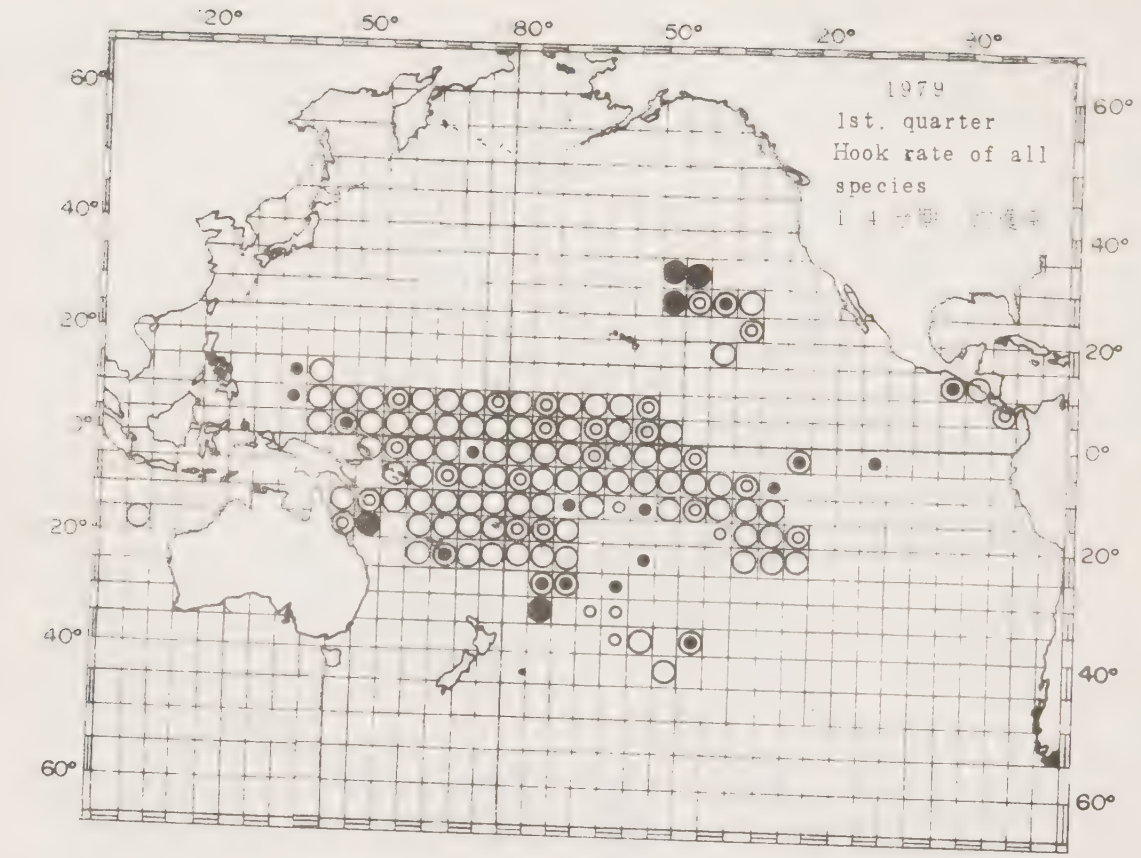
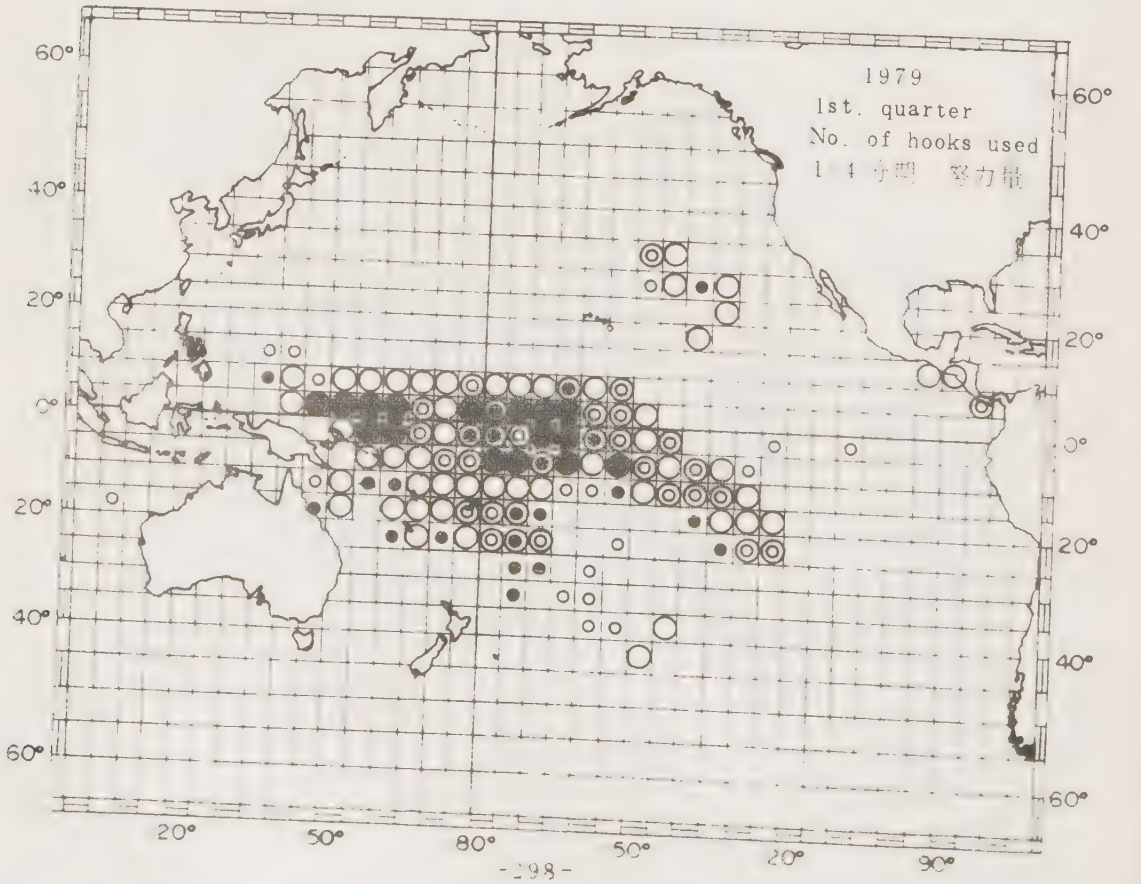
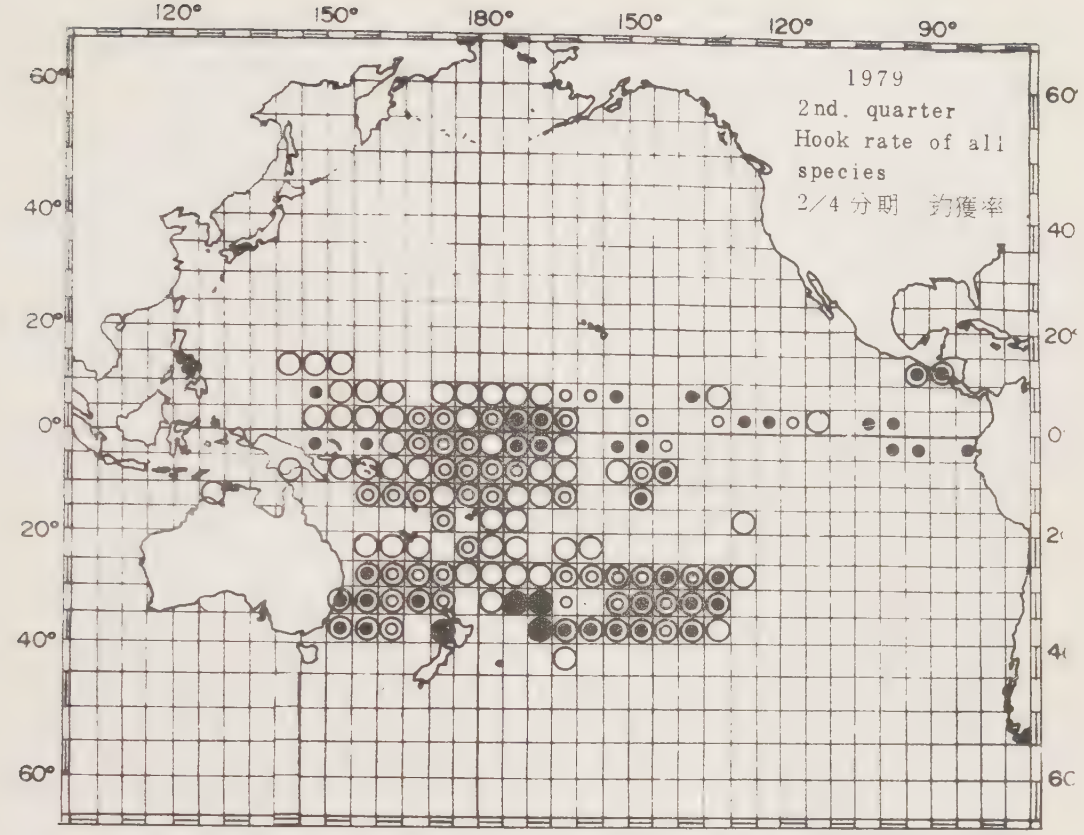
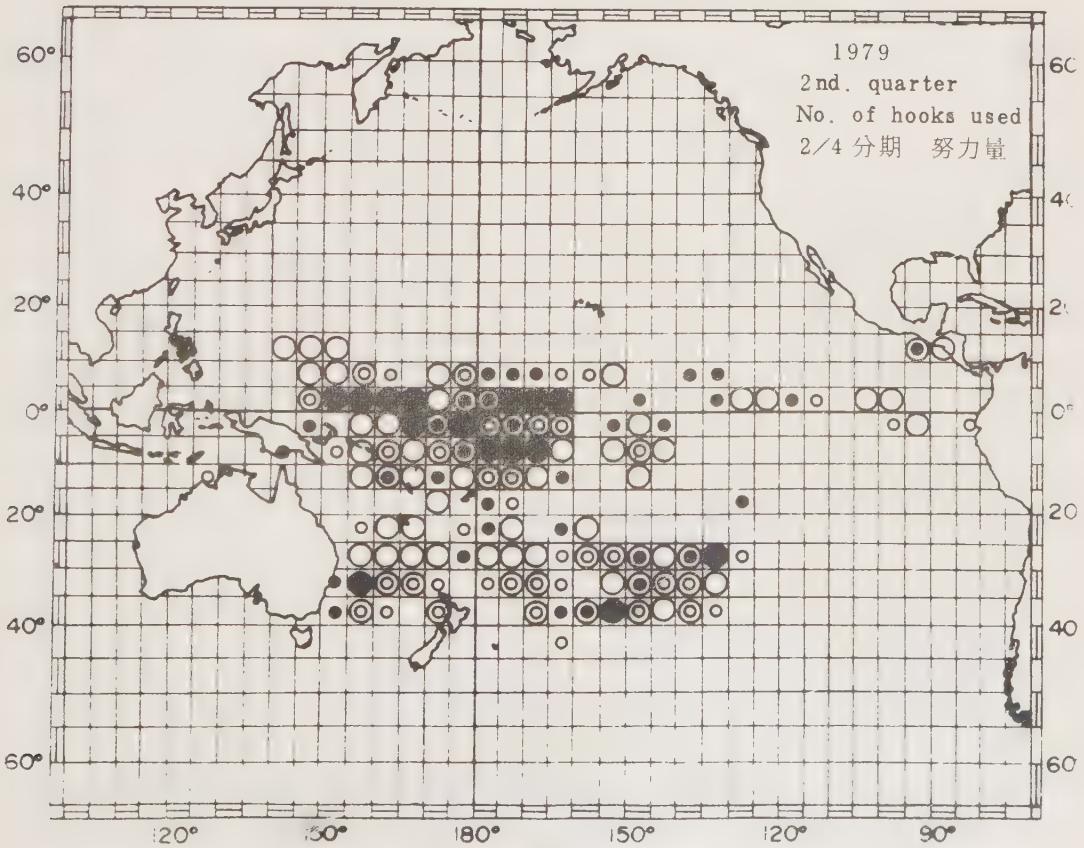
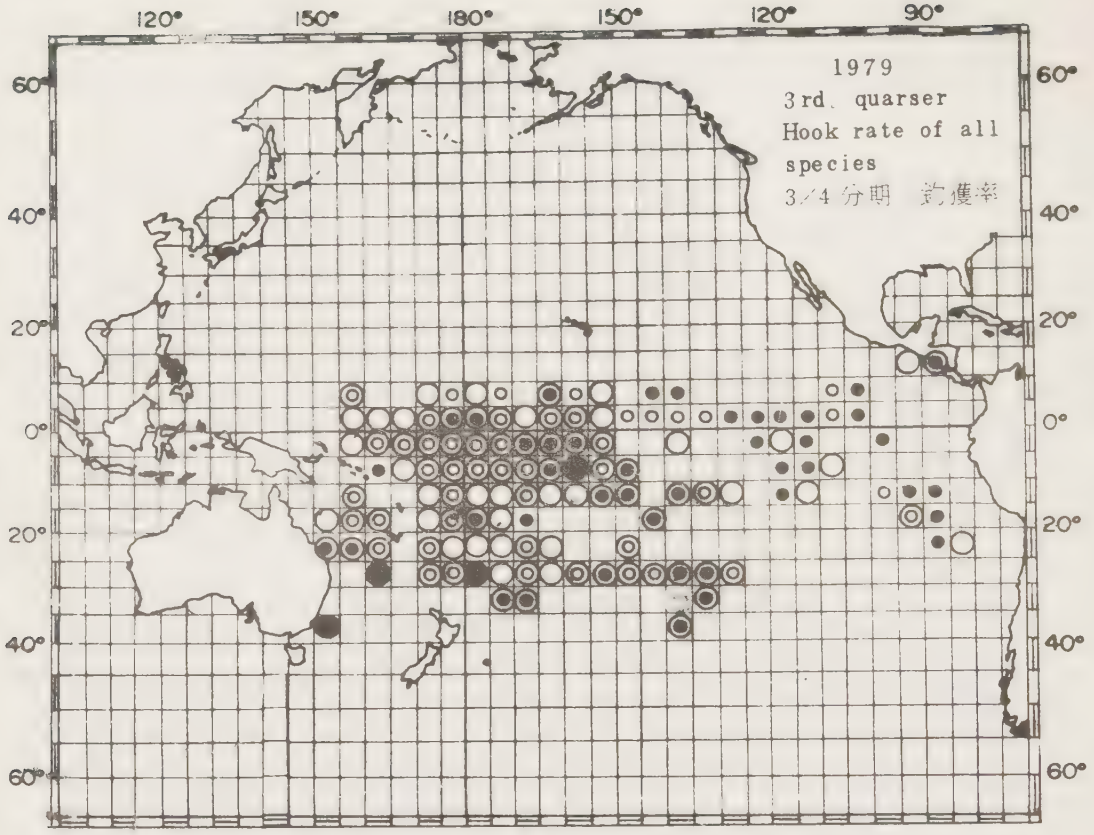
40°
20°
0°
20°
40°
60°
1979
Jan. - Dec.
No. of hooks used
總努力量

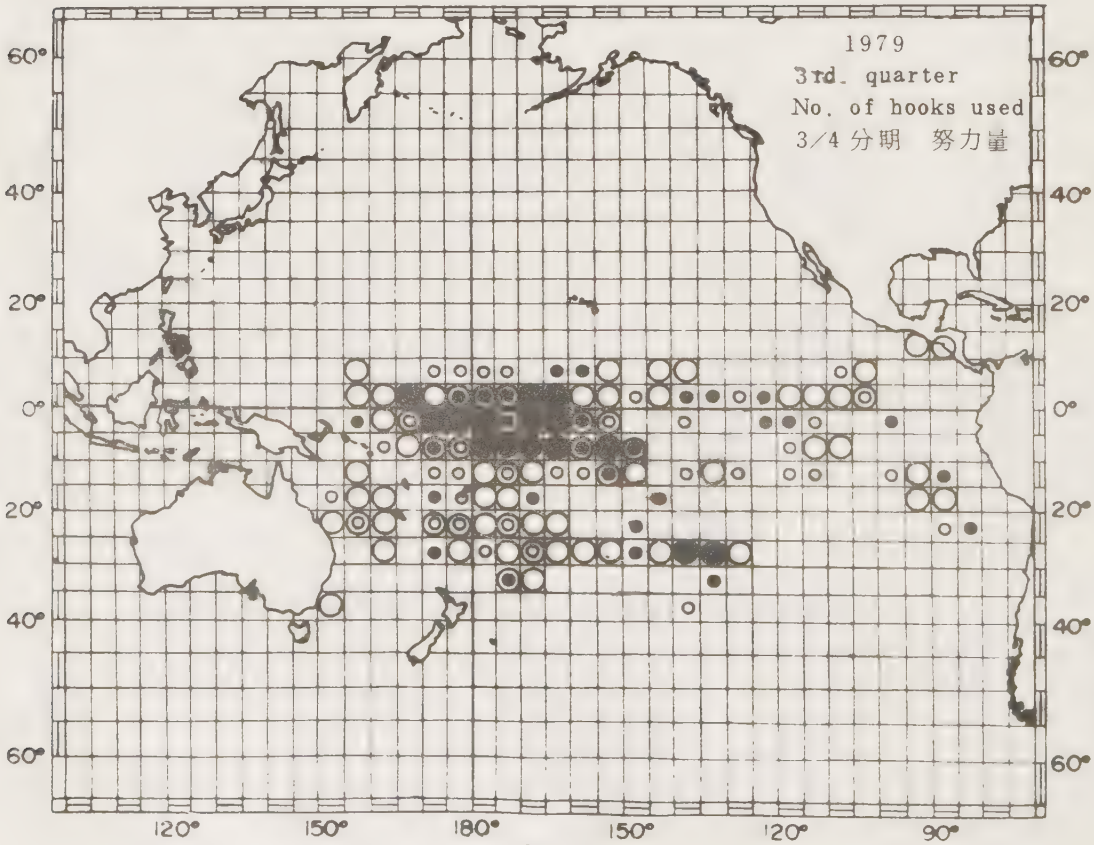

1979
1st. quarter
Hook rate of all species
1 4 寸釣 針数

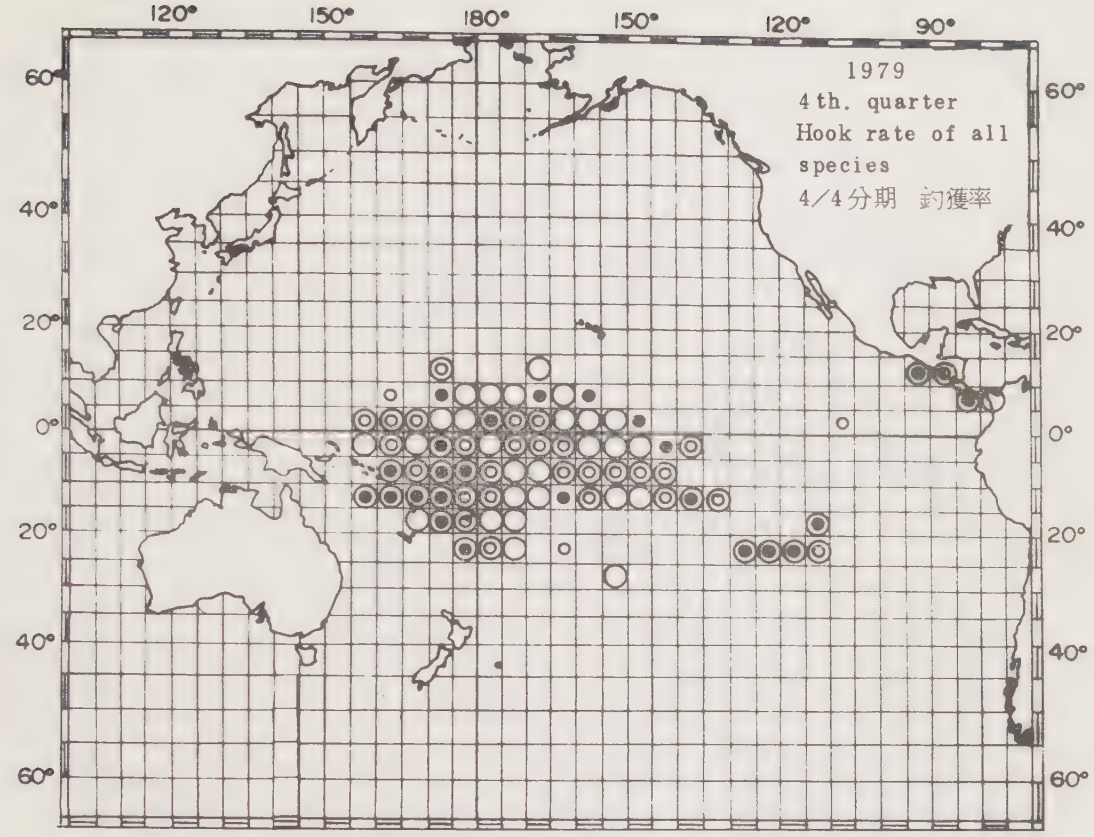

1979
1st. quarter
No. of hooks used
1 4 寸釣 努力量


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
2nd. quarter
Hook rate of all species
2/4 分期 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
2nd. quarter
No. of hooks used
2/4 分期 努力量


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
3rd. quarser
Hook rate of all
species
3/4 分期 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
3rd. quarter
No. of hooks used
3/4 分期 努力量


120°
150°
180°
150°
120°
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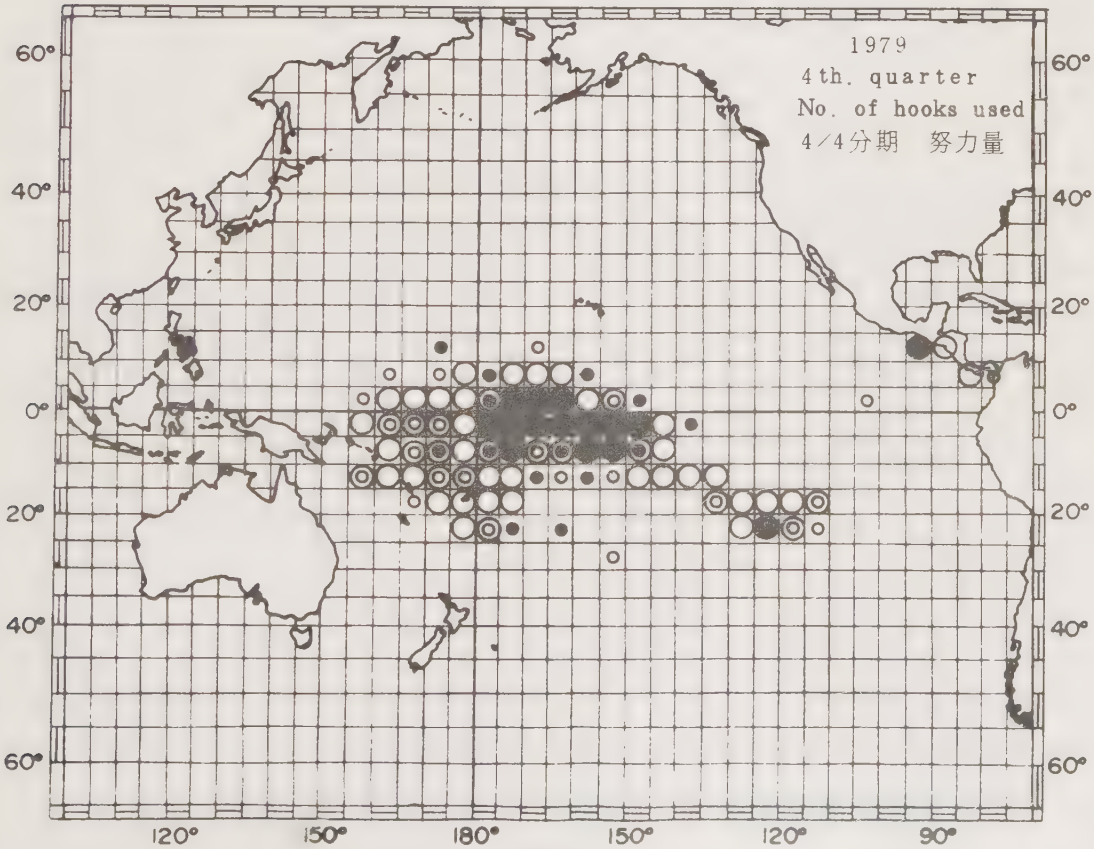
40°
20°
0°
20°
40°
60°
1979
4th. quarter
Hook rate of all species
4/4分期 釣獲率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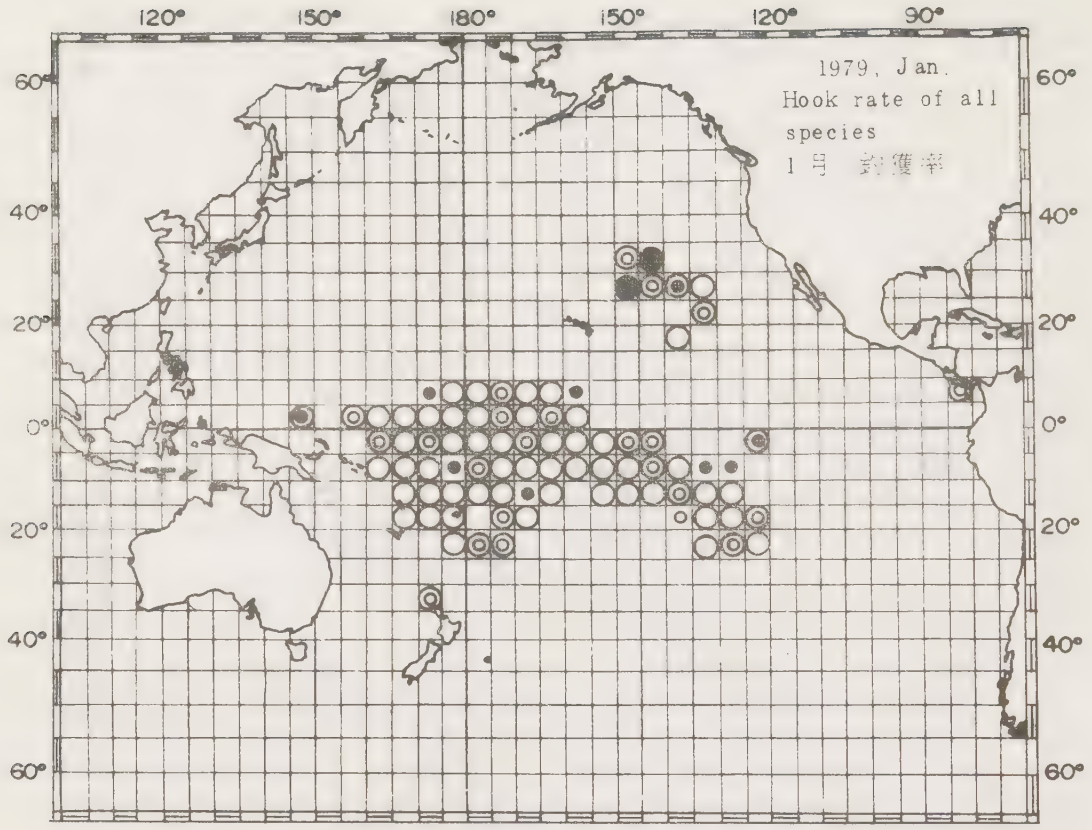
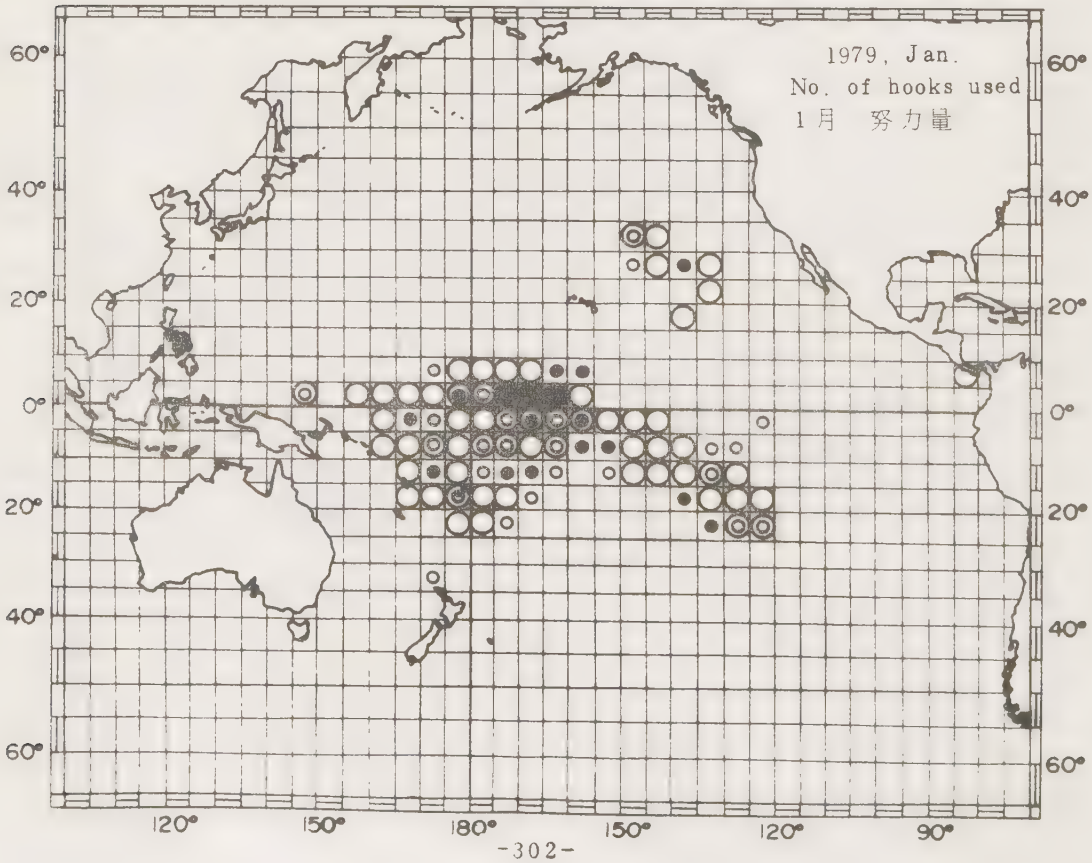
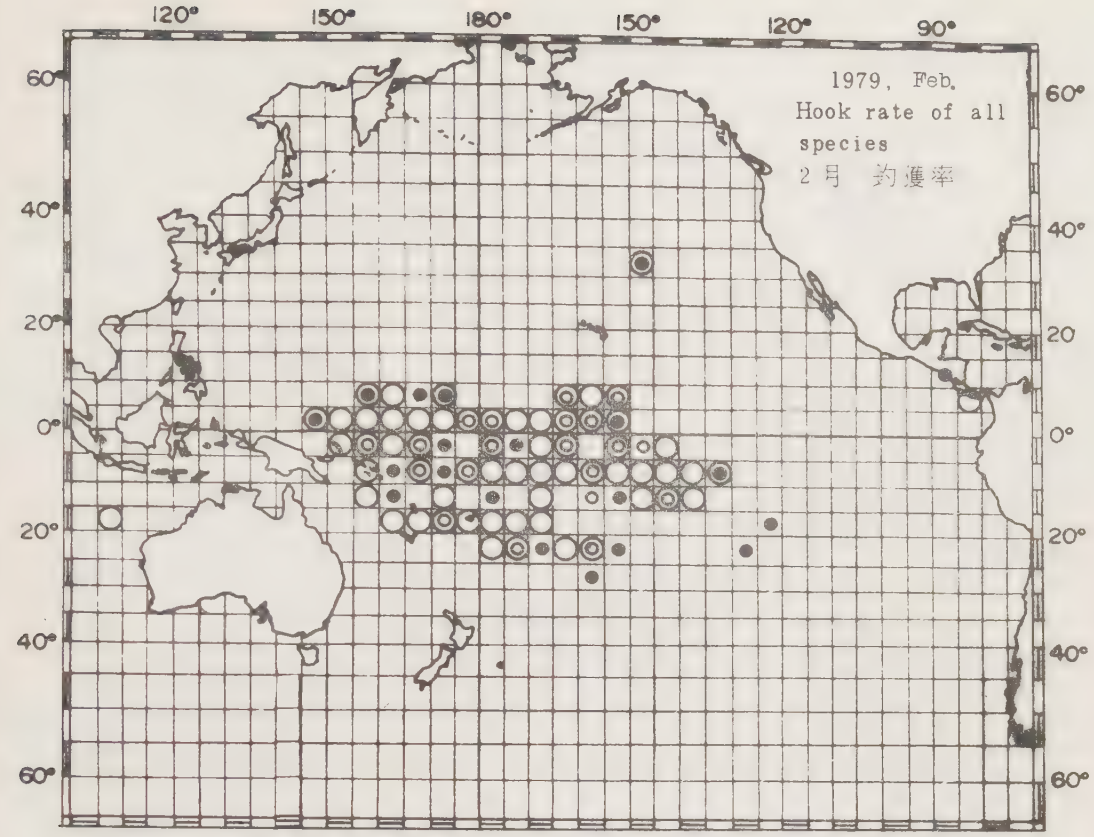
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
4th. quarter
No. of hooks used
4/4分期 努力量


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Jan.
Hook rate of all species
1月 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Jan.
No. of hooks used
1月 努力量


120°
150°
180°
150°
120°
90°
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20°
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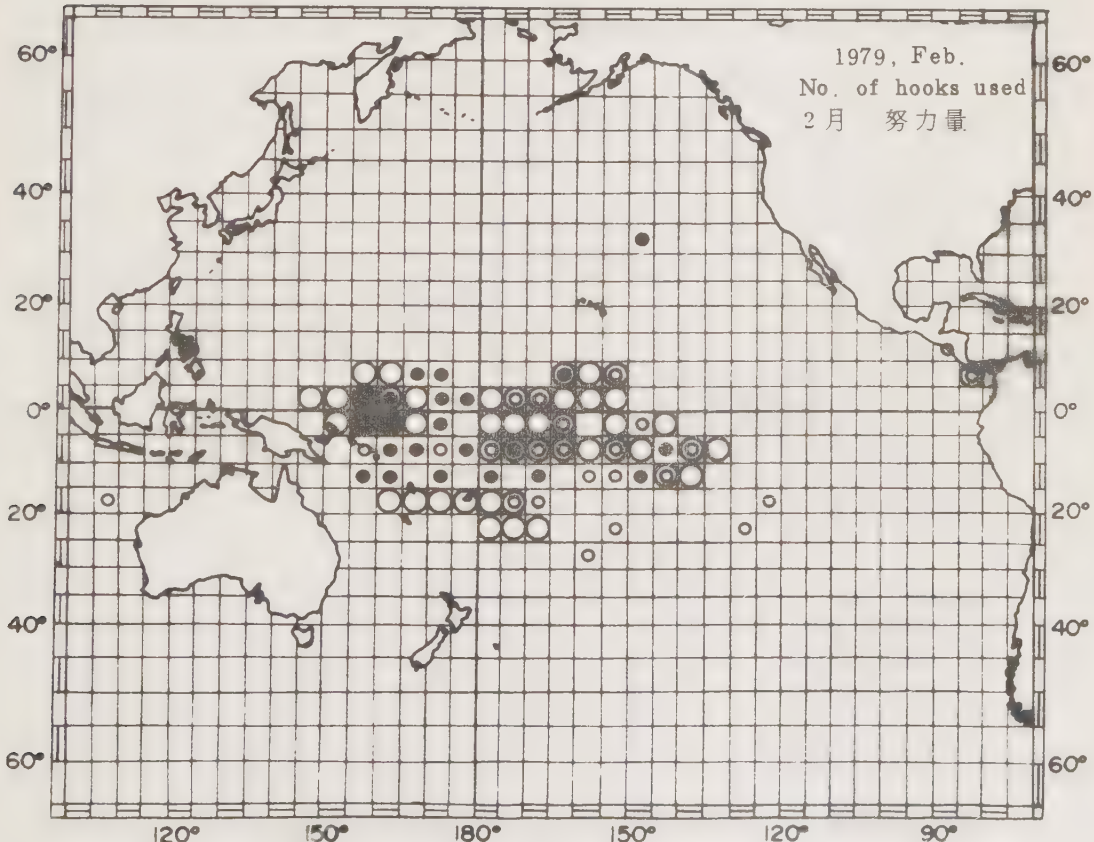
40°
60°
1979, Feb.
Hook rate of all species
2月 釣獲率


120°
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180°
150°
120°
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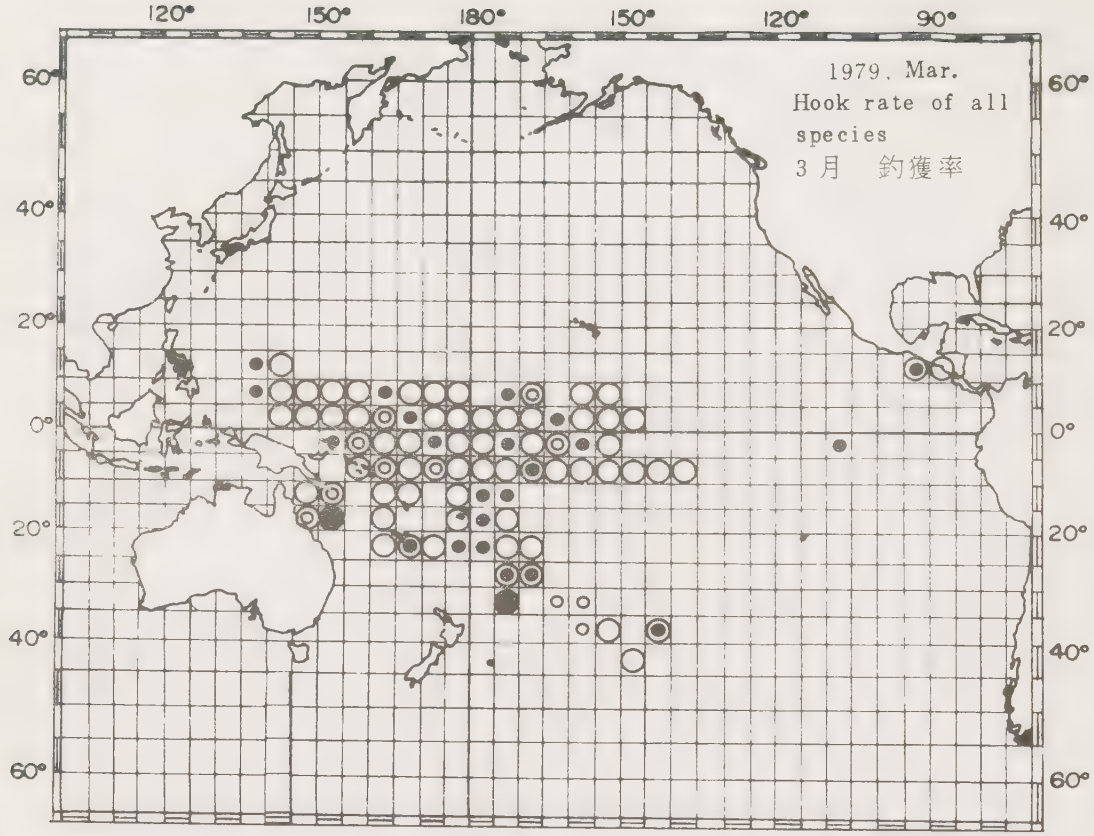
0°
20°
40°
60°
1979, Feb.
No. of hooks used
2月 努力量


120°
150°
180°
150°
120°
90°
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20°
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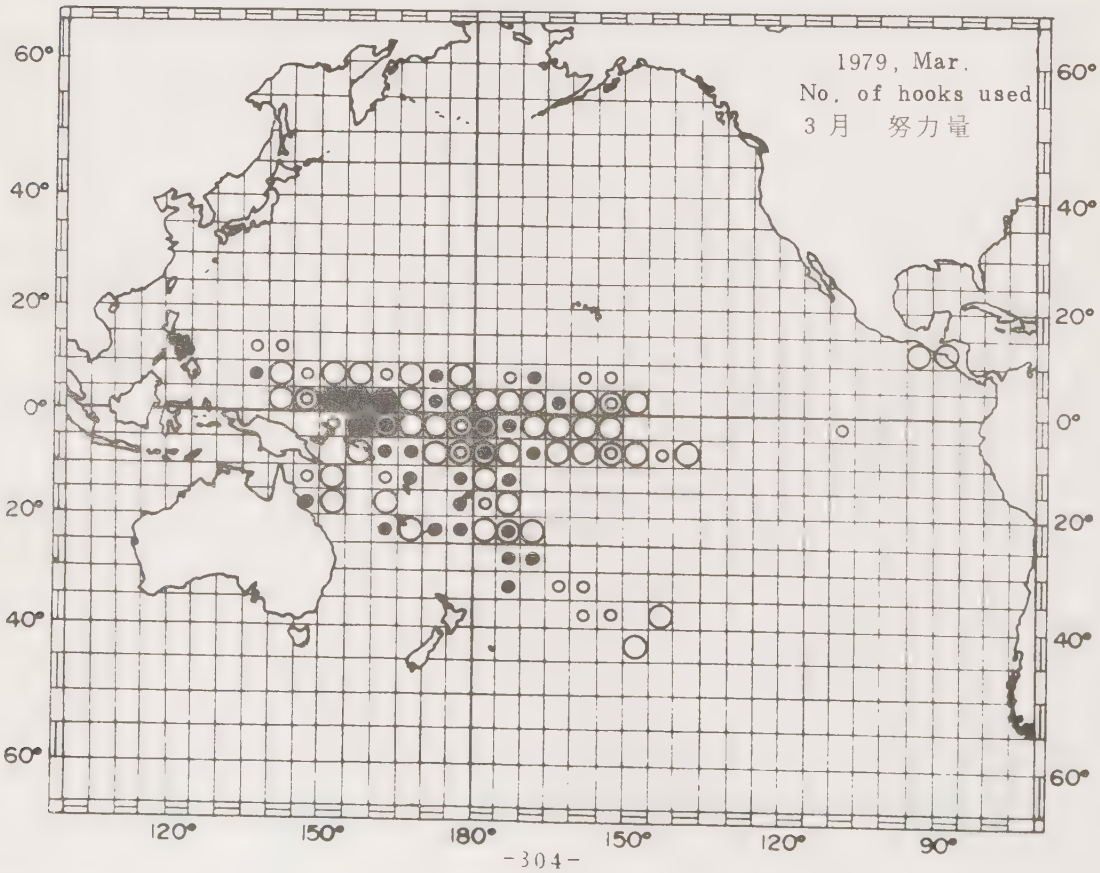
20°
40°
60°
1979, Mar.
Hook rate of all species
3月　釣獲率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150°
180°
150°
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60°
40°
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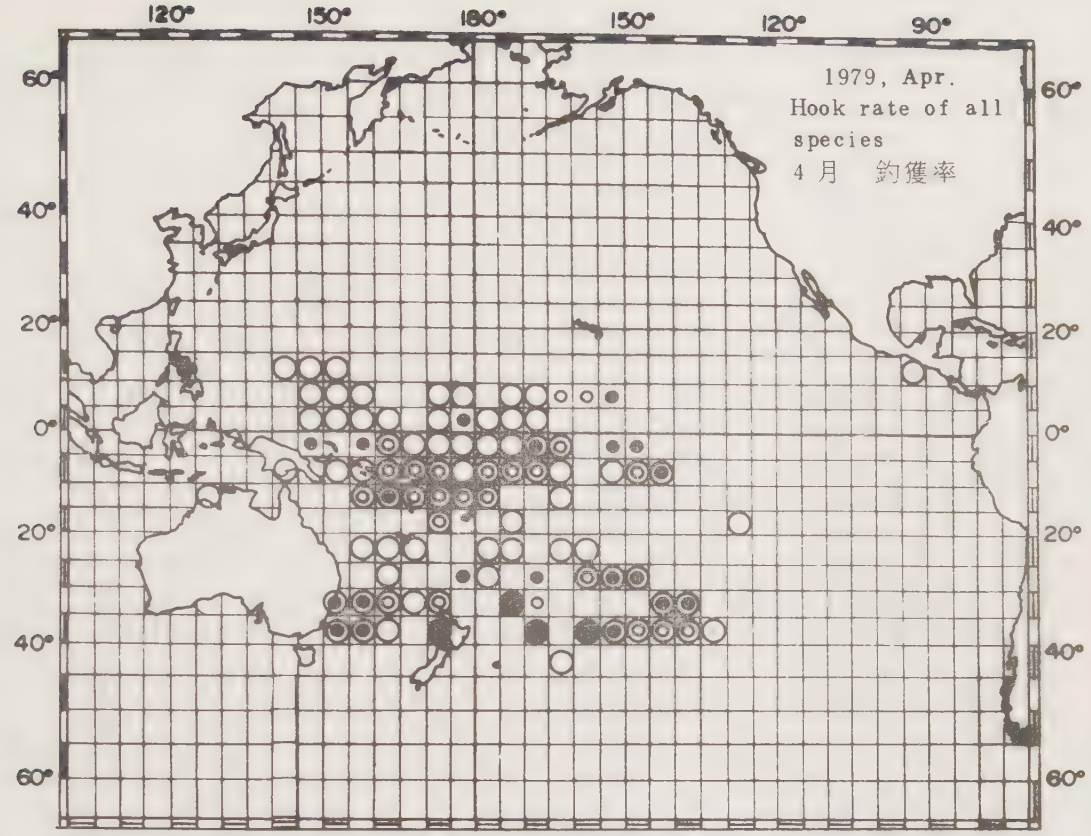
20°
40°
60°
1979, Mar.
No. of hooks used
3月　努力量


120°
150°
180°
150°
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90°
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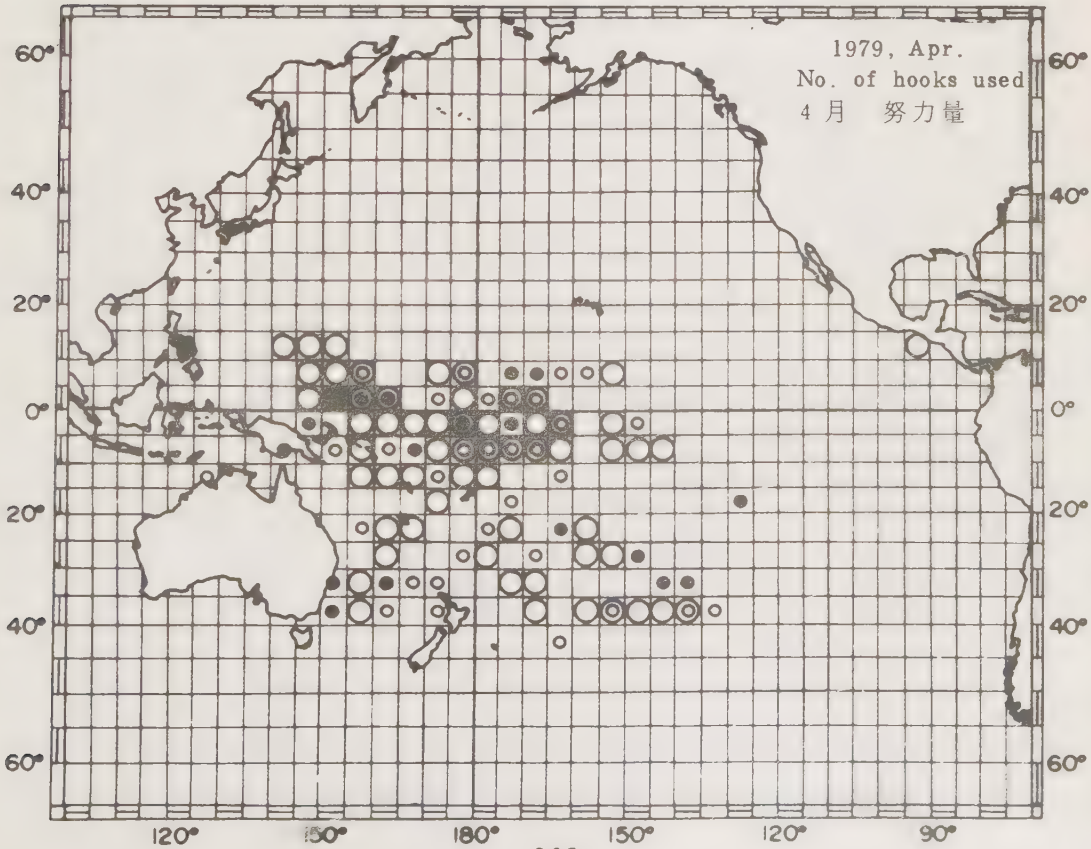
40°
20°
0°
20°
40°
60°
1979, Apr.
Hook rate of all species
4 月　釣獲率


120°
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180°
150°
120°
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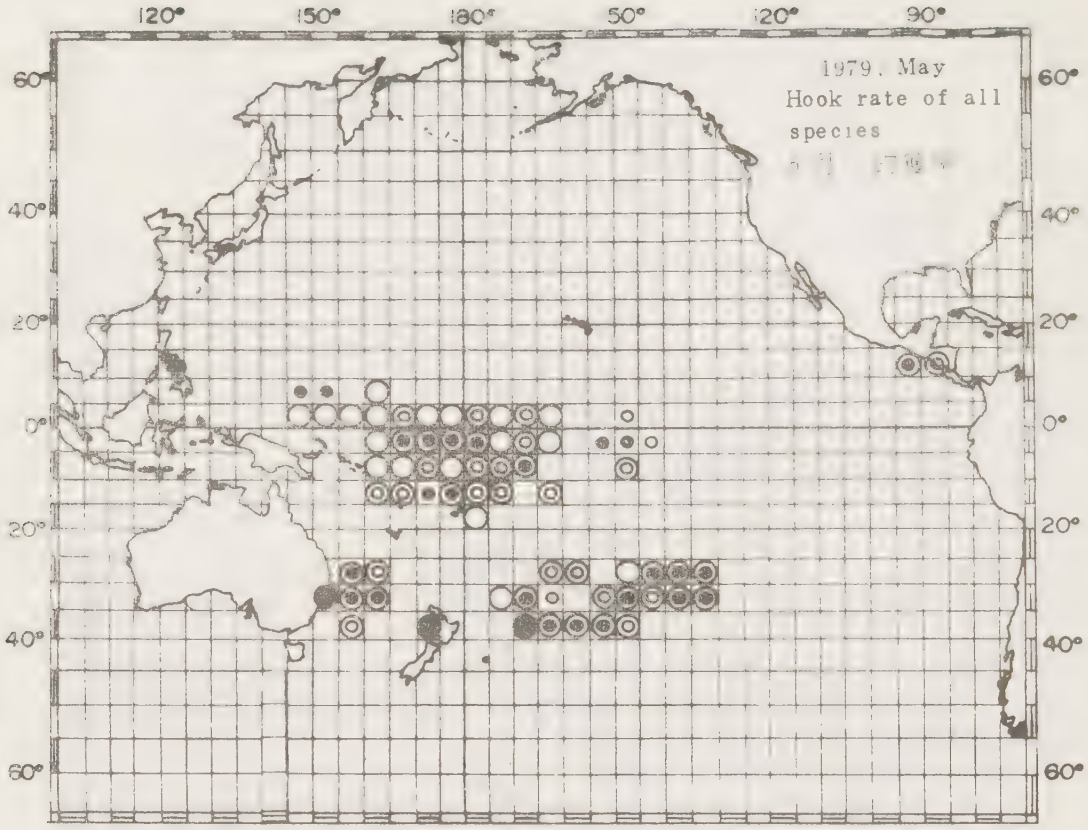
40°
20°
0°
20°
40°
60°
1979, Apr.
No. of hooks used
4 月　努力量


120°
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180°
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120°
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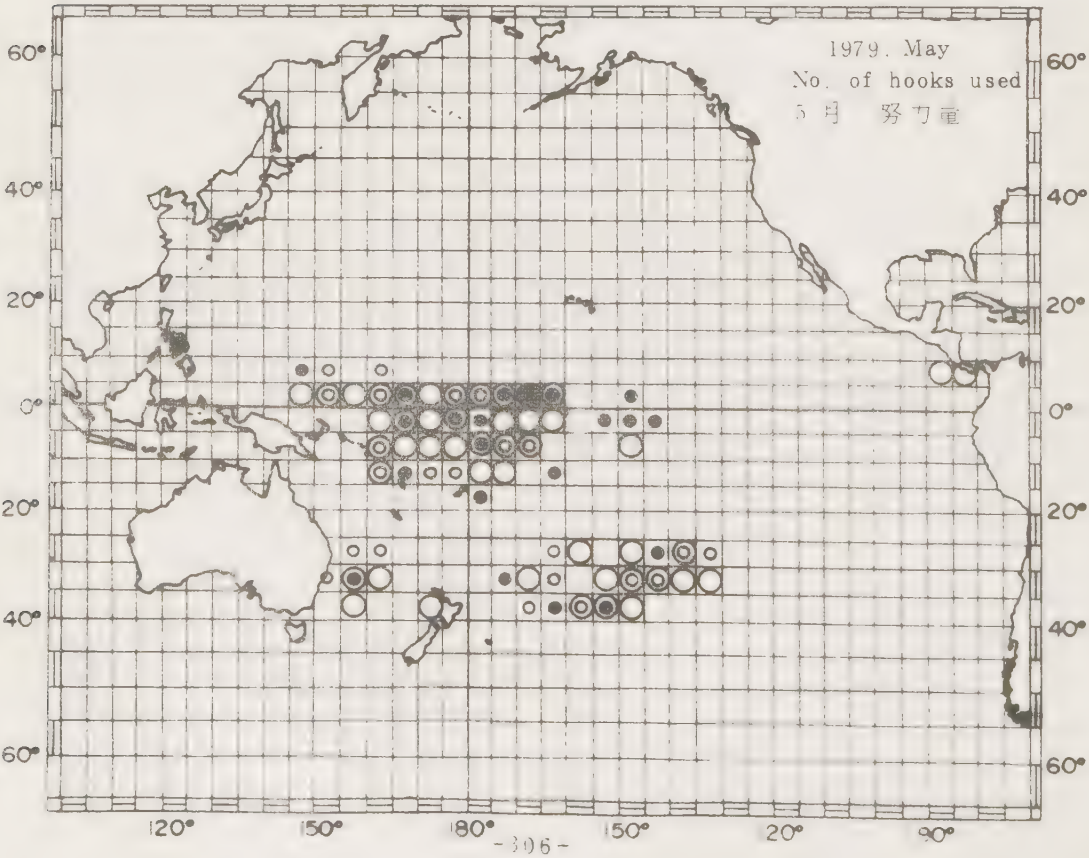
20°
40°
60°
1979. May
Hook rate of all
species


60°
40°
20°
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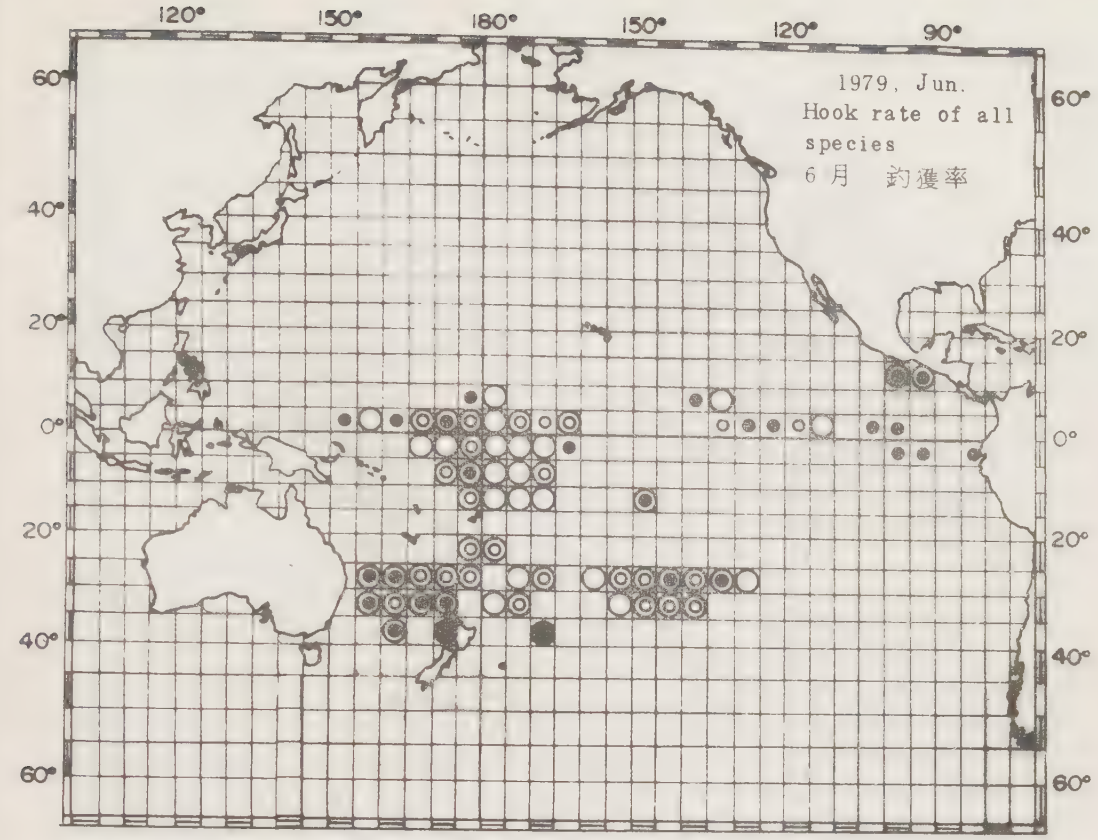
20°
40°
60°
1979. May
No. of hooks used
120°
150°
180°
150°
120°
90°


120°
150°
180°
150°
120°
90°
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40°
20°
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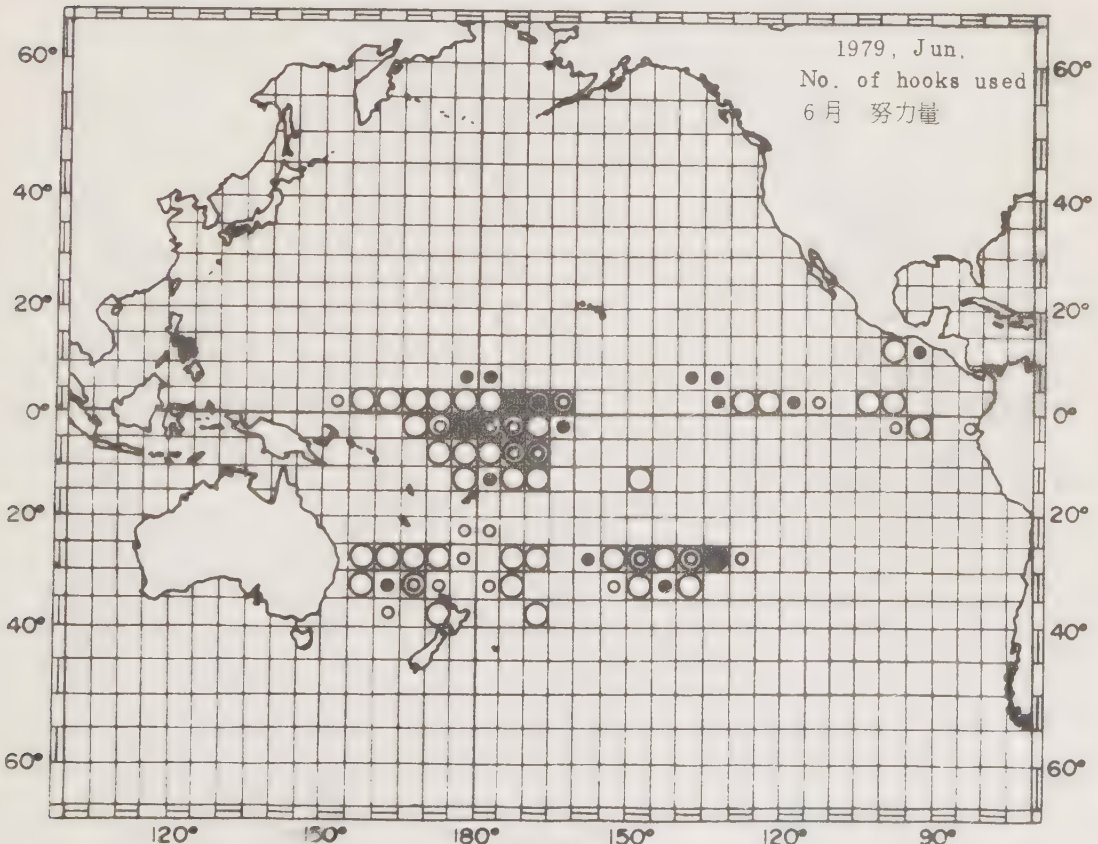
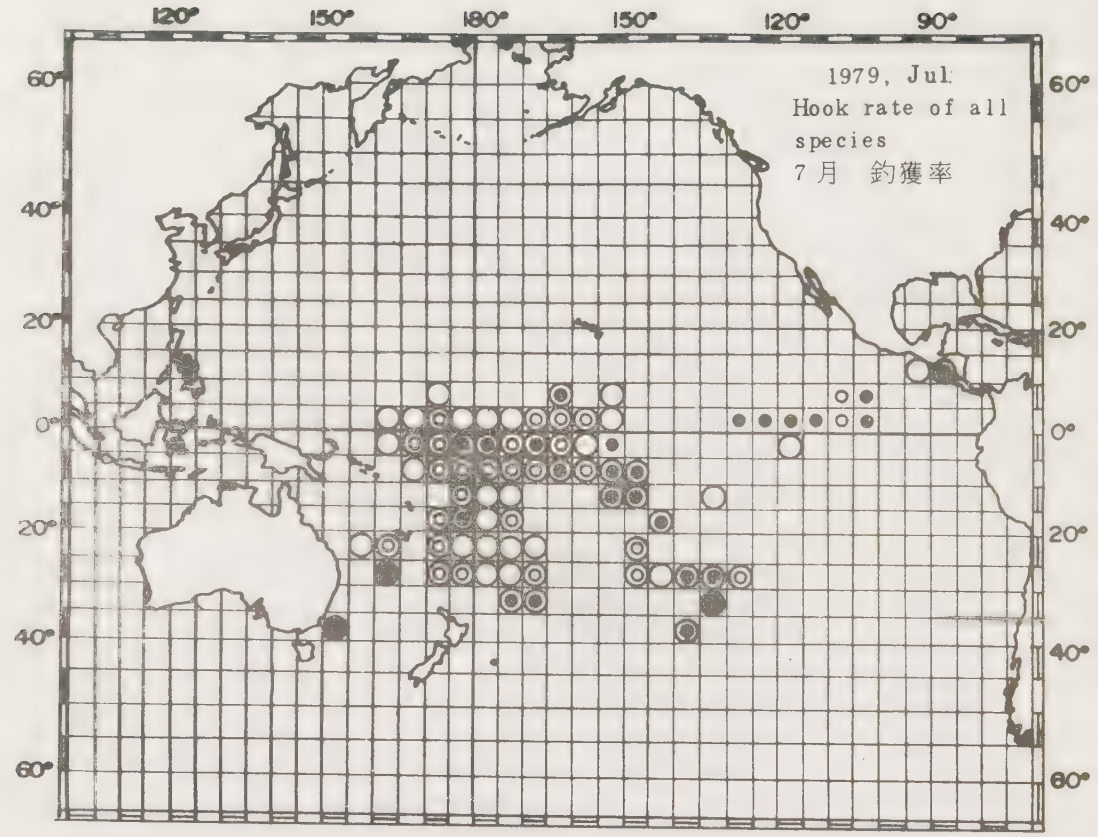
20°
40°
60°
1979, Jun.
Hook rate of all species
6月 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Jun.
No. of hooks used
6月 努力量


120°
150°
180°
150°
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90°
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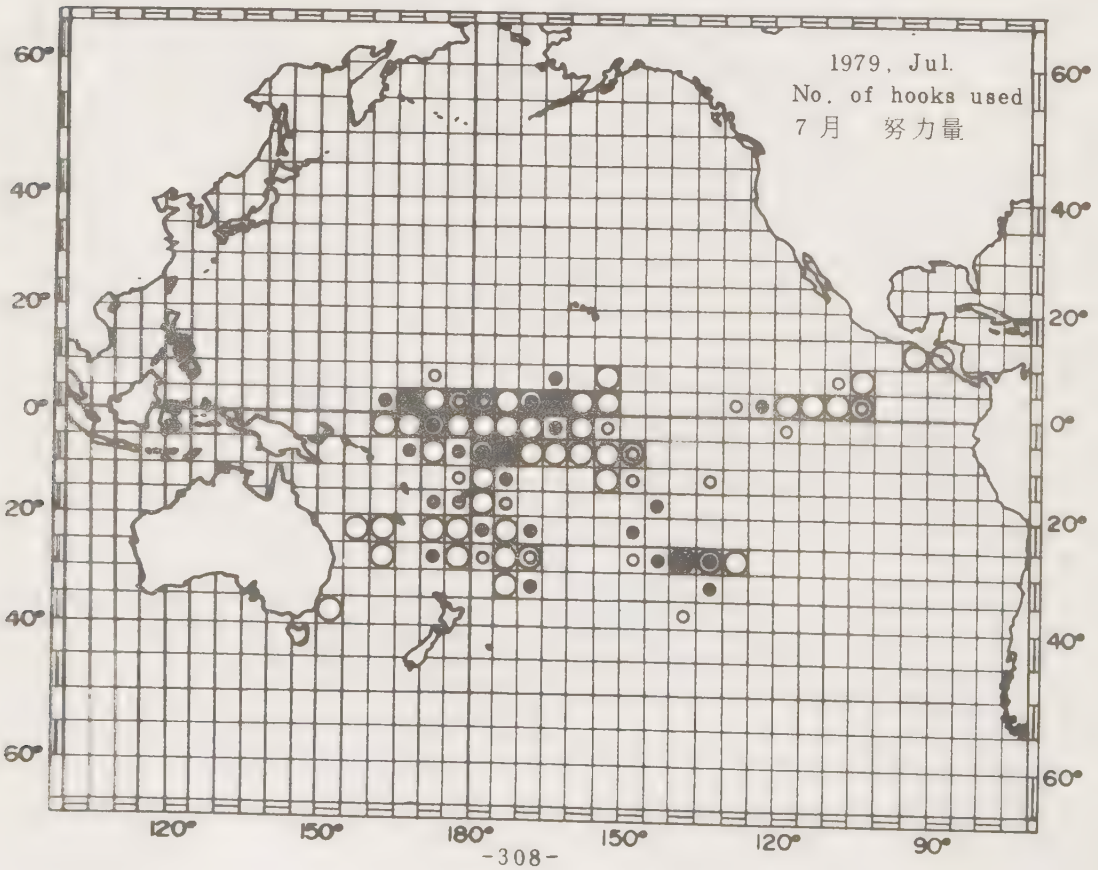
40°
20°
0°
20°
40°
60°
1979, Jul.
Hook rate of all species
7月　釣獲率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180°
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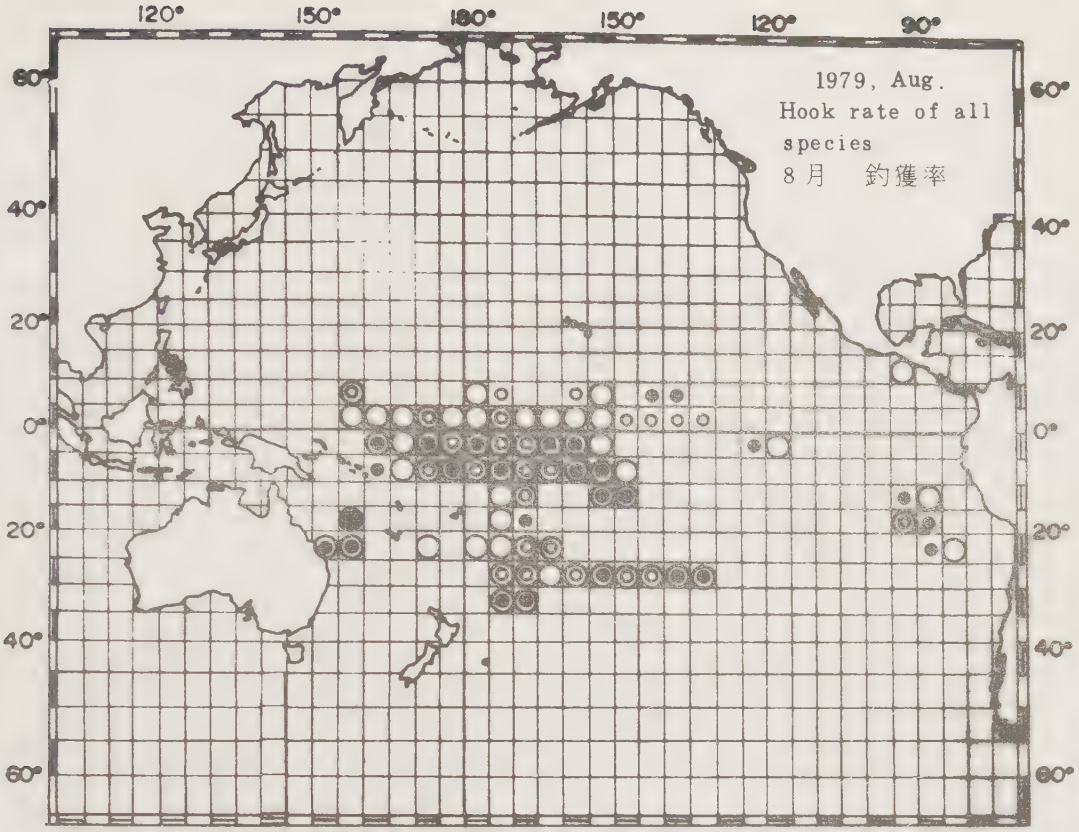
20°
40°
60°
1979, Jul.
No. of hooks used
7月　努力量


120°
150°
180°
150°
120°
90°
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40°
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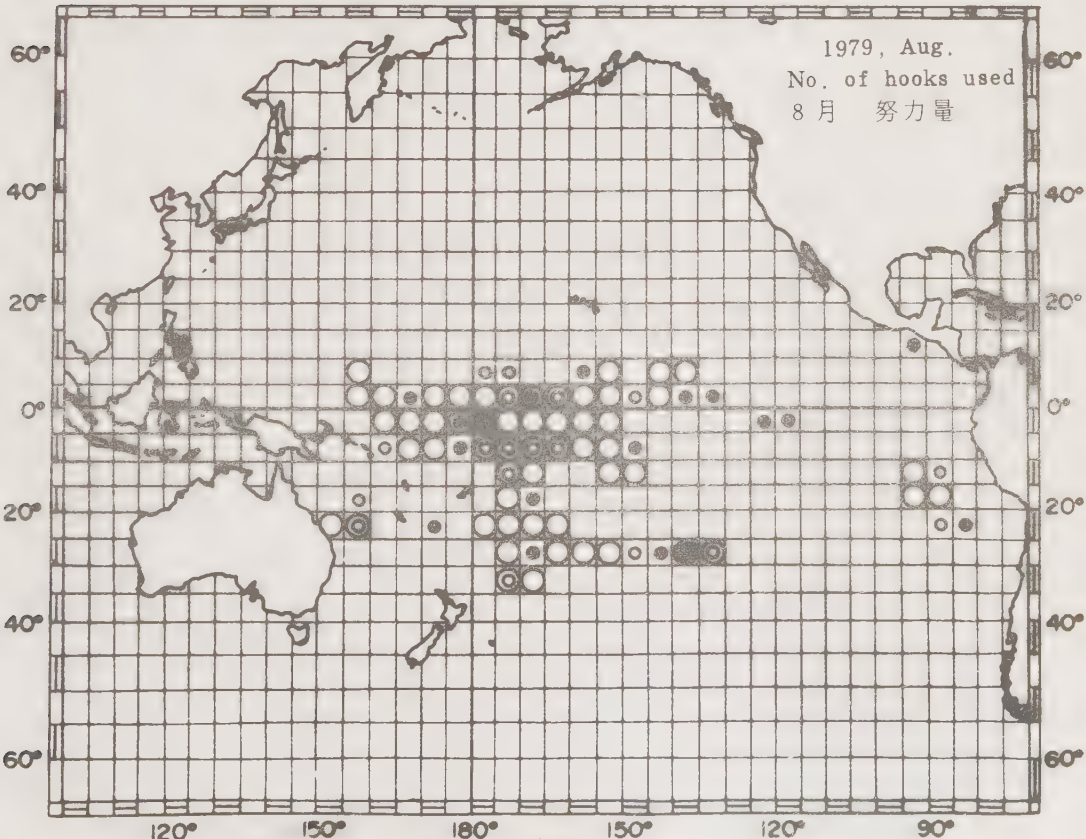
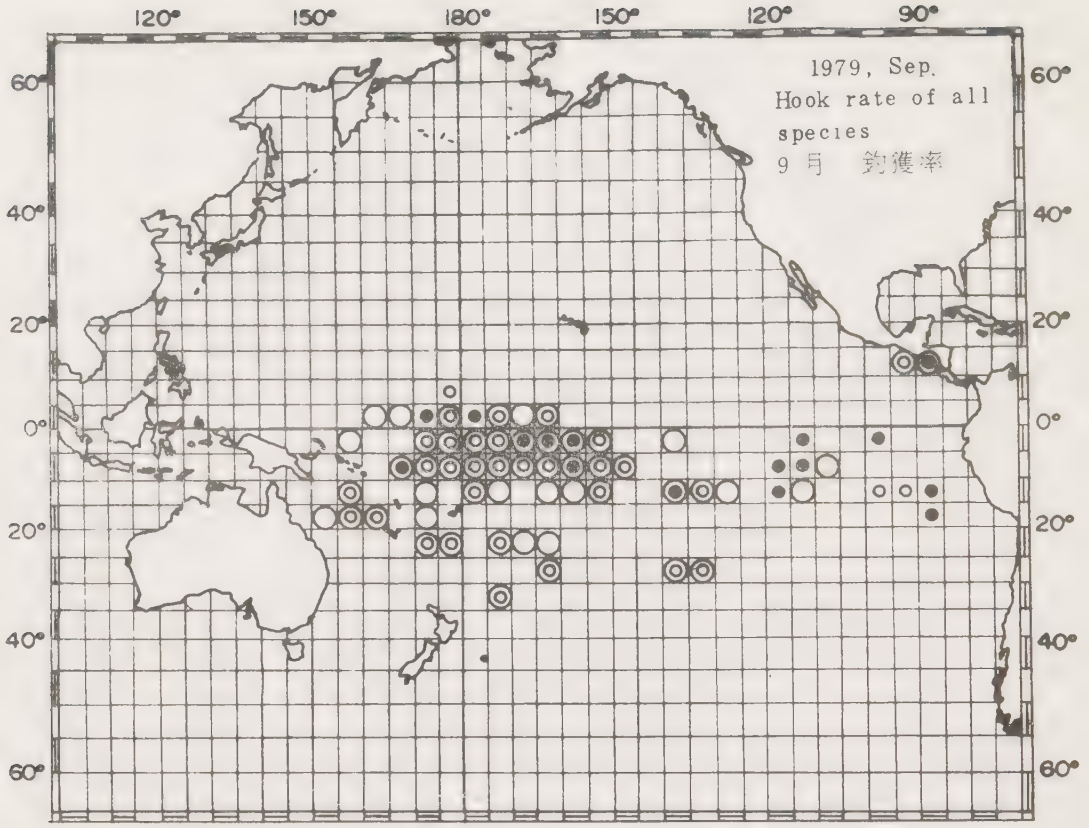
0°
20°
40°
60°
1979, Aug.
Hook rate of all species
8月　釣獲率


60°
40°
20°
0°
20°
40°
60°
1979, Aug.
No. of hooks used
8月　努力量
120°
150°
180°
150°
120°
90°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180°
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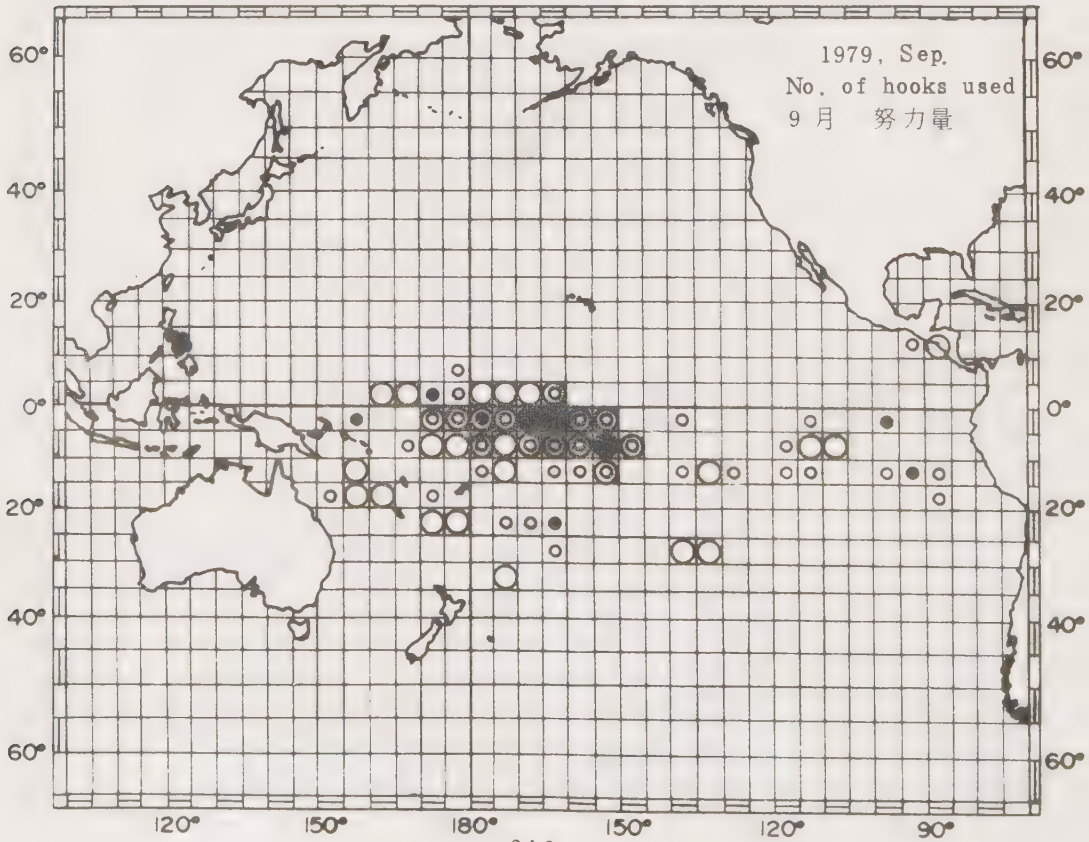
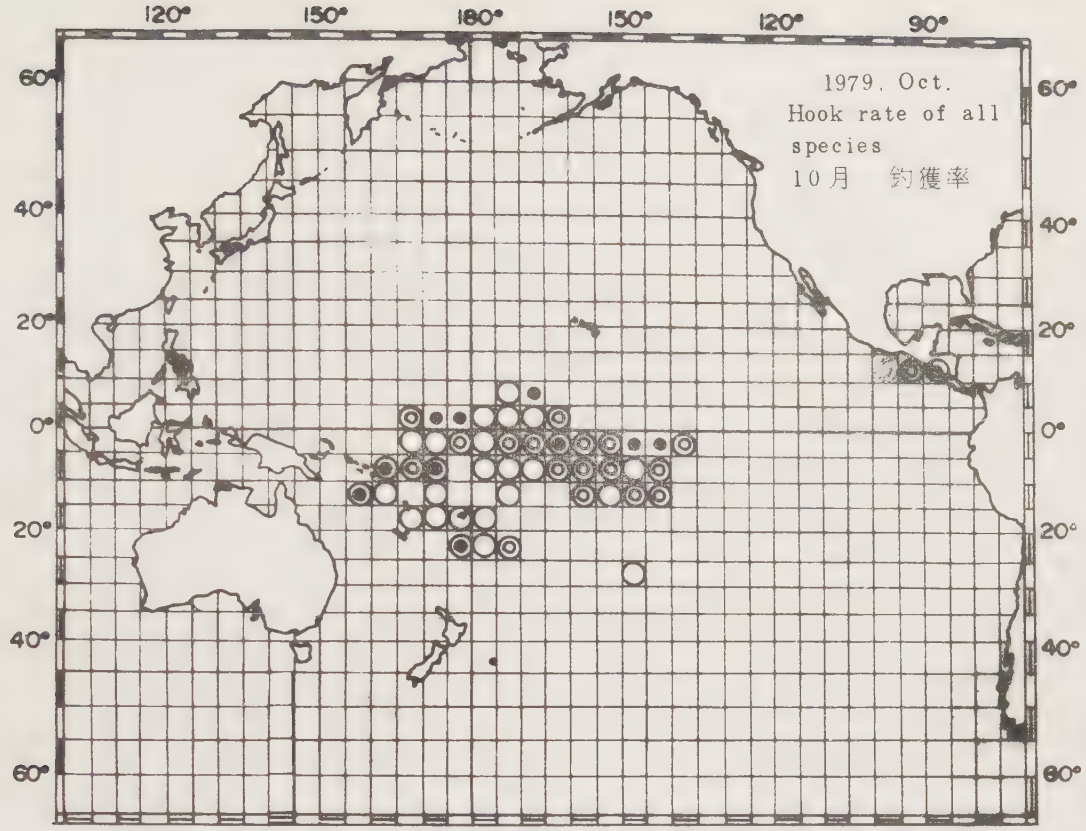
40°
60°
1979, Sep.
Hook rate of all species
9月 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Sep.
No. of hooks used
9月 努力量


120°
150°
180°
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40°
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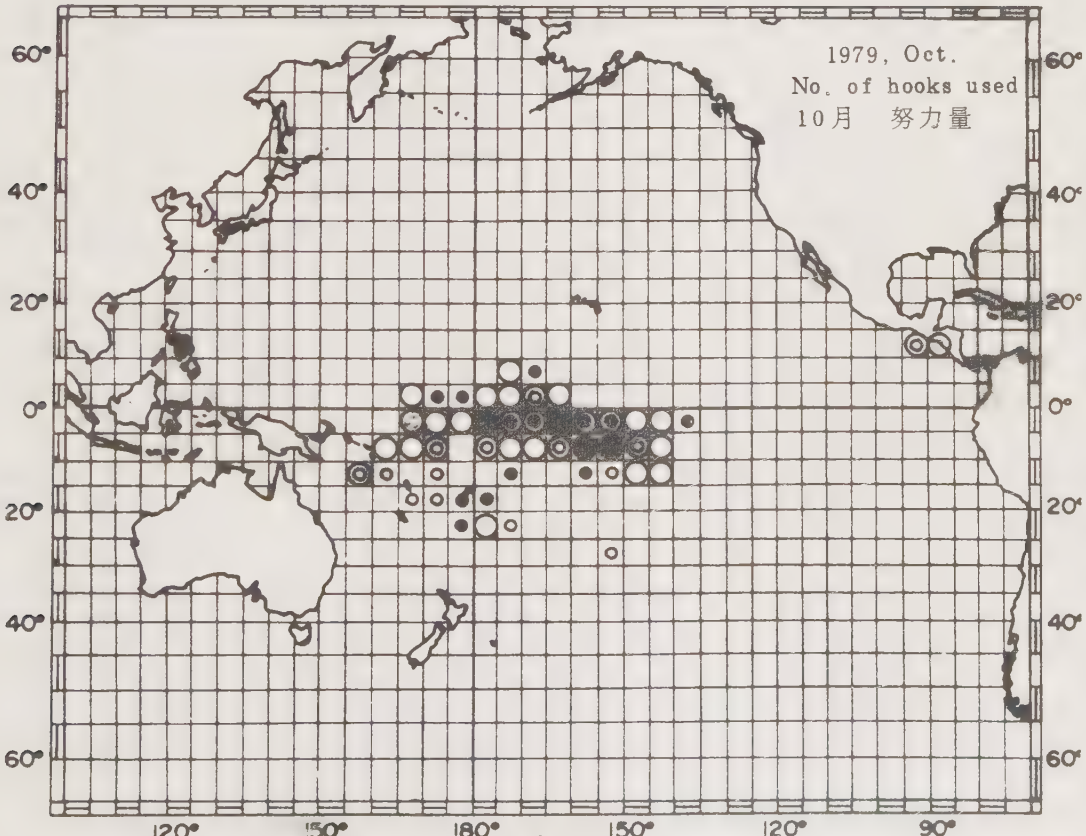
20°
40°
60°
1979, Oct.
Hook rate of all species
10月　釣獲率


120°
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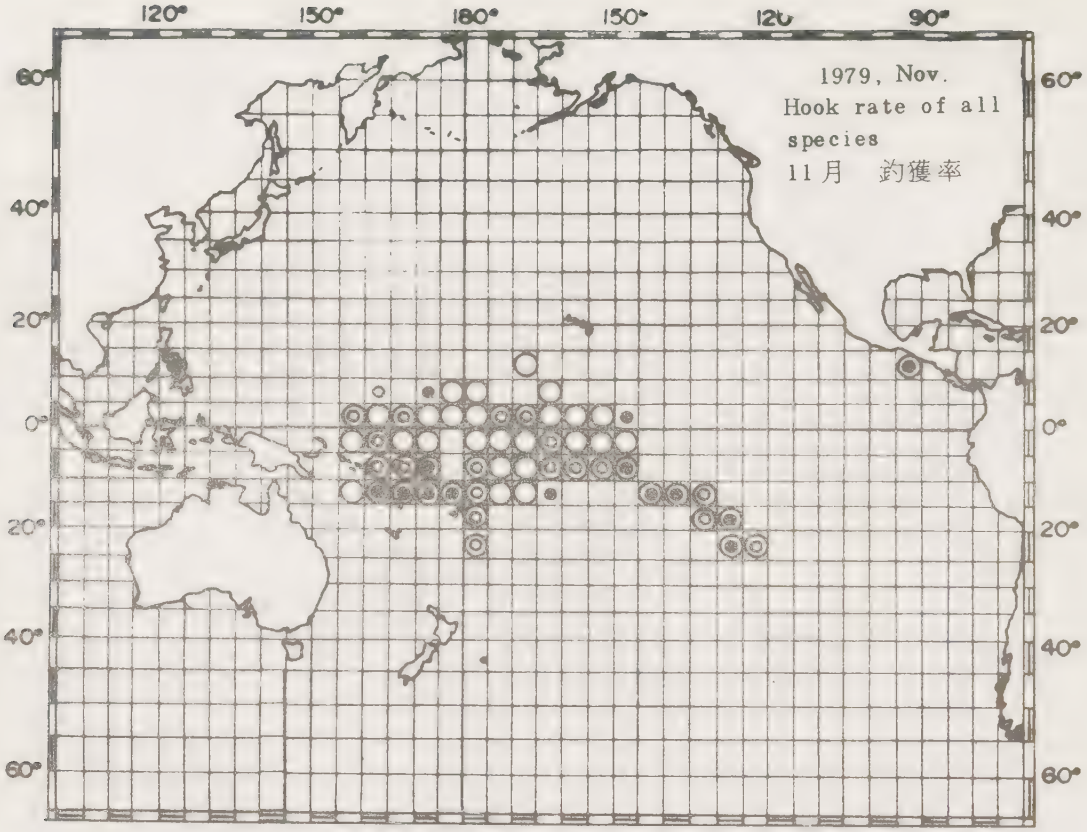
60°
1979, Oct.
No. of hooks used
10月　努力量


120°
150°
180°
150°
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90°
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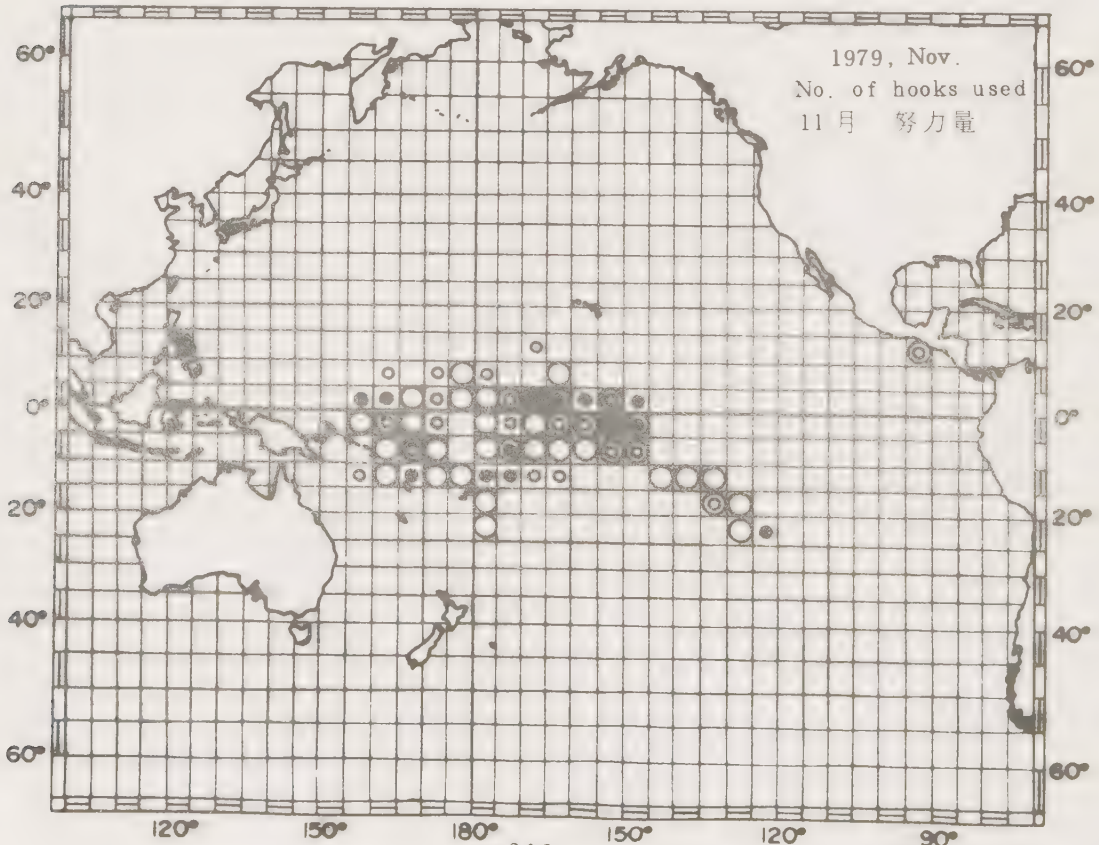
40°
20°
0°
20°
40°
60°
1979, Nov.
Hook rate of all species
11月　釣獲率


120°
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180°
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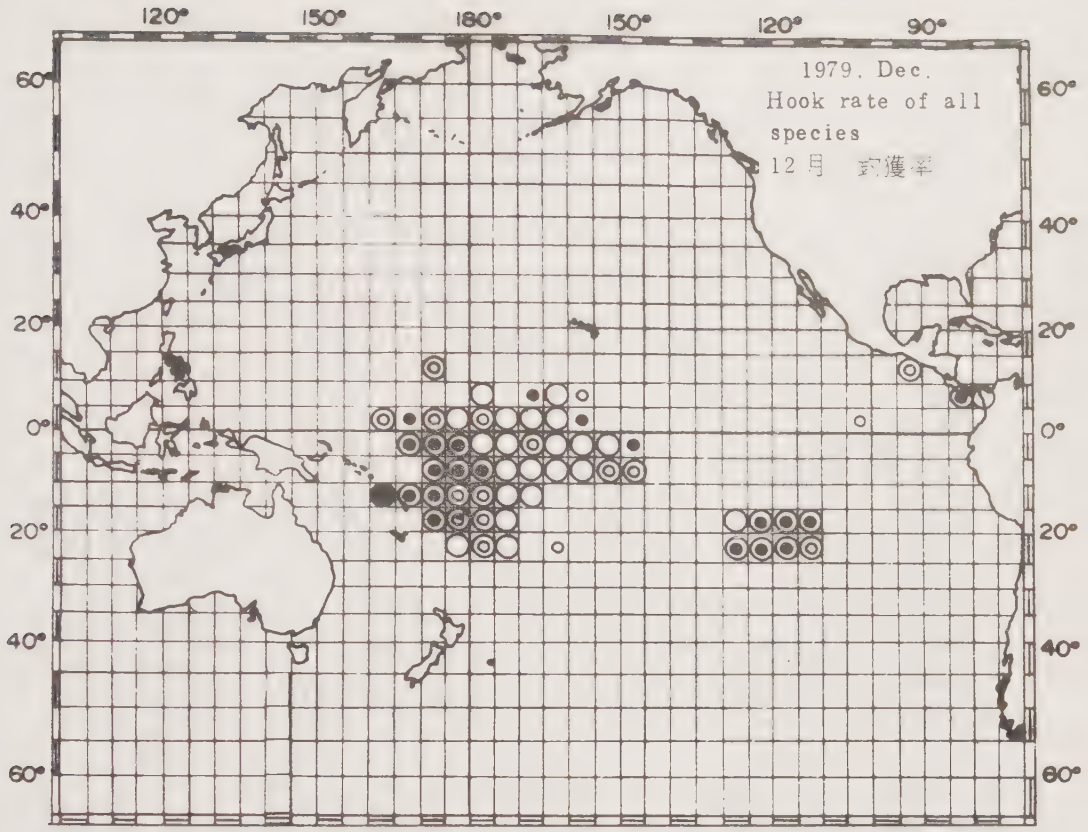
20°
40°
60°
1979, Nov.
No. of hooks used
11月　努力量


120°
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90°
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40°
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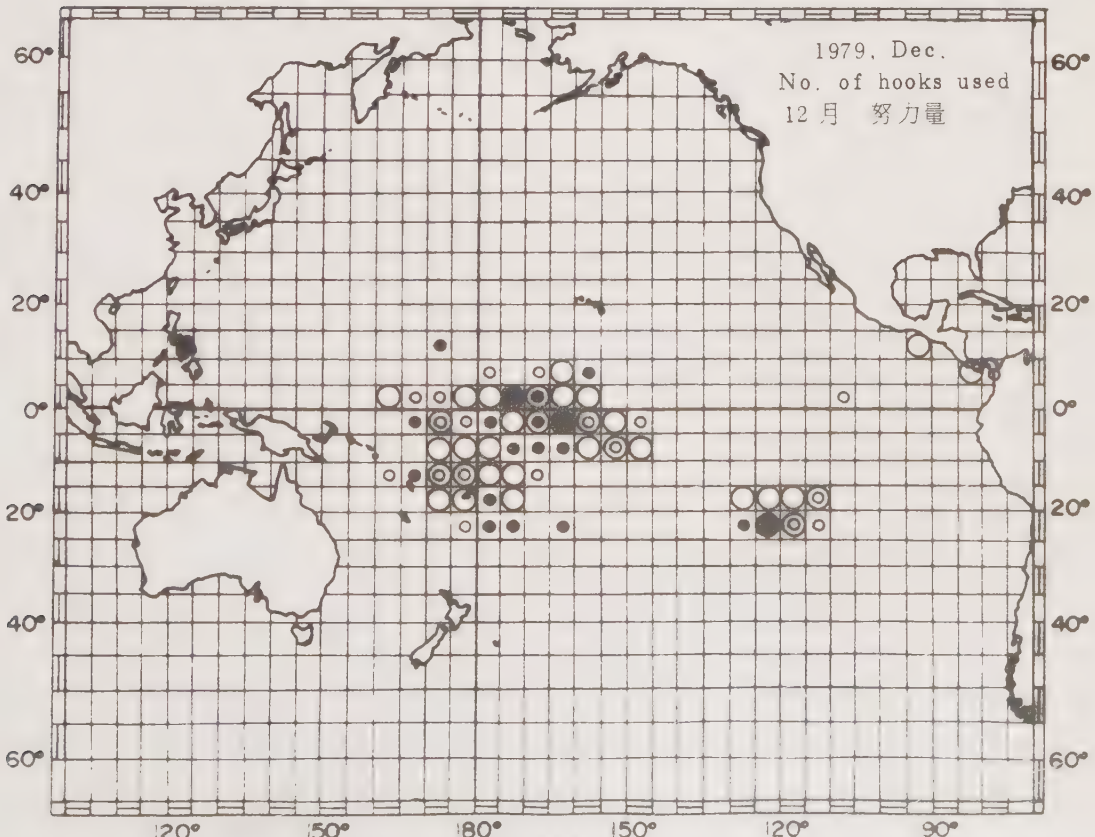
0°
20°
40°
60°
1979. Dec.
Hook rate of all species
12月 釣獲率

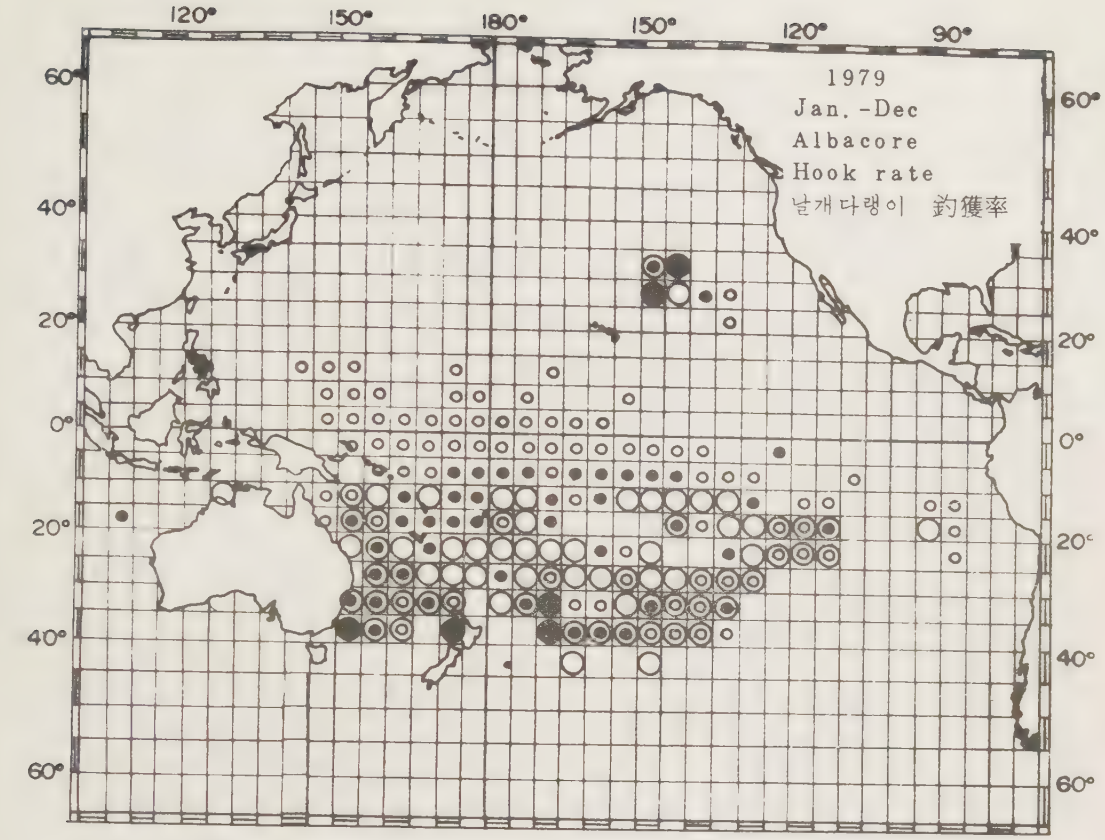

60°
40°
20°
0°
20°
40°
60°
120°
150°
180°
150°
120°
90°
1979. Dec.
No. of hooks used
12月 努力量

날개다랭이, 황다랭이, 눈다랭이
釣獲率 및 漁獲努力 分布圖

Albacore, Yellowfin, Bigeye
Hook rate and fishing effort

날 개 다 랭 이

Albacore


120°
150°
180°
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120°
90°
60°
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20°
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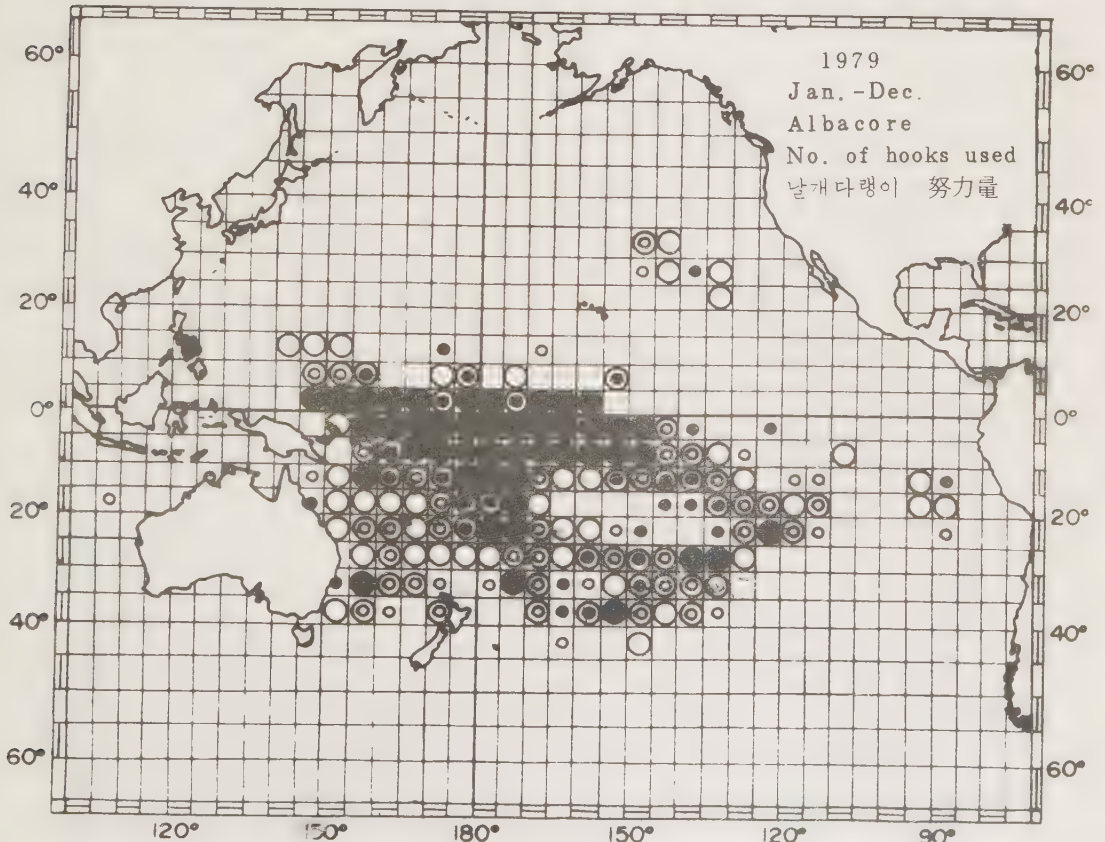
20°
40°
60°
1979
Jan.-Dec
Albacore
Hook rate
날개다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
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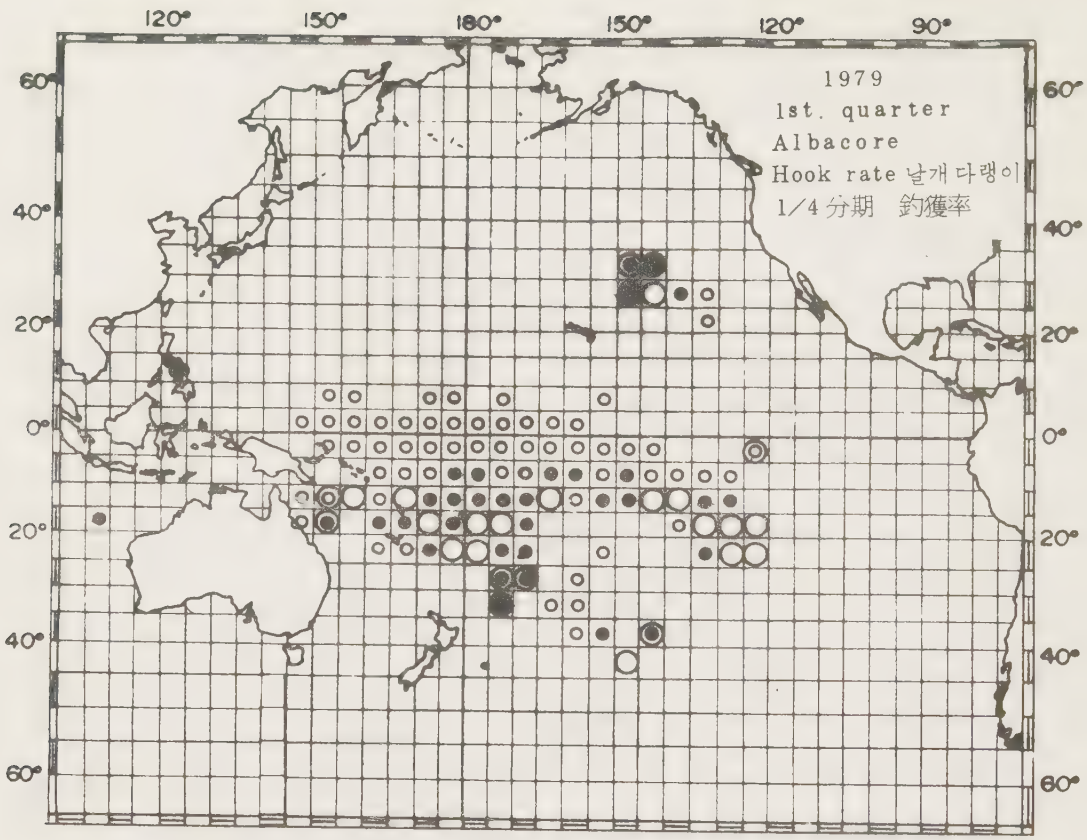
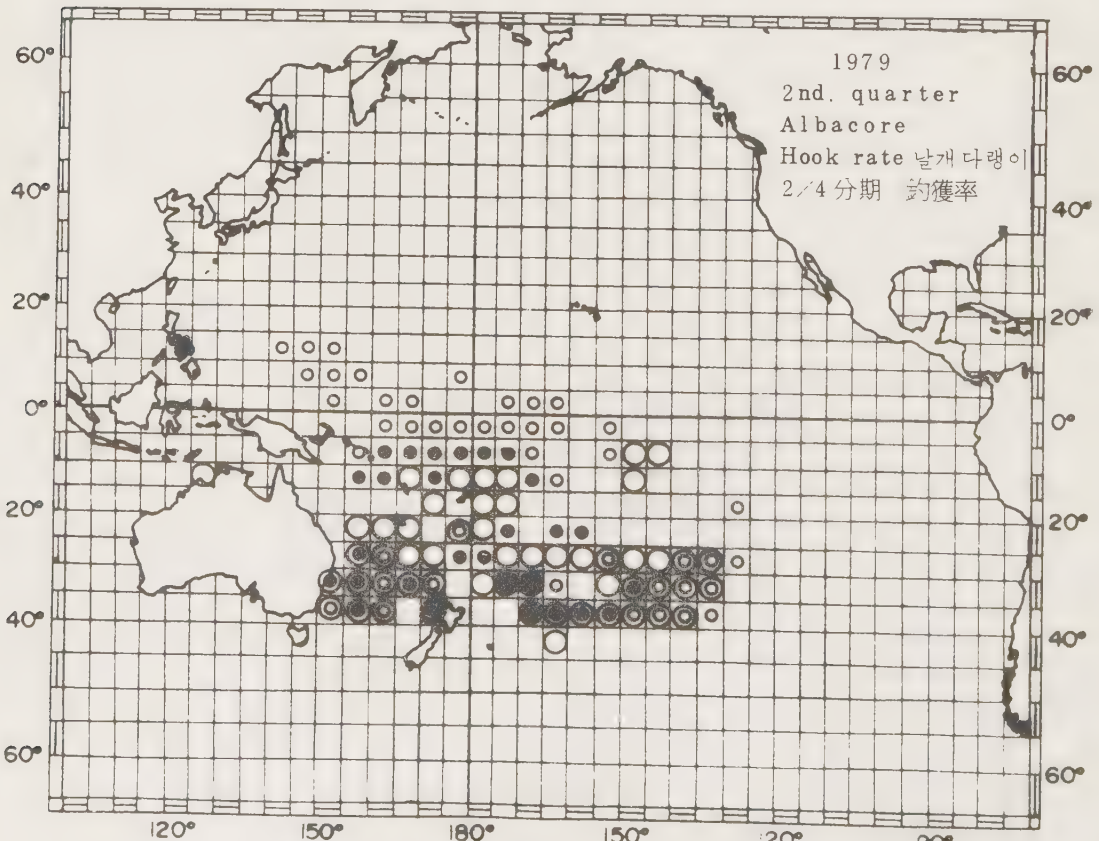
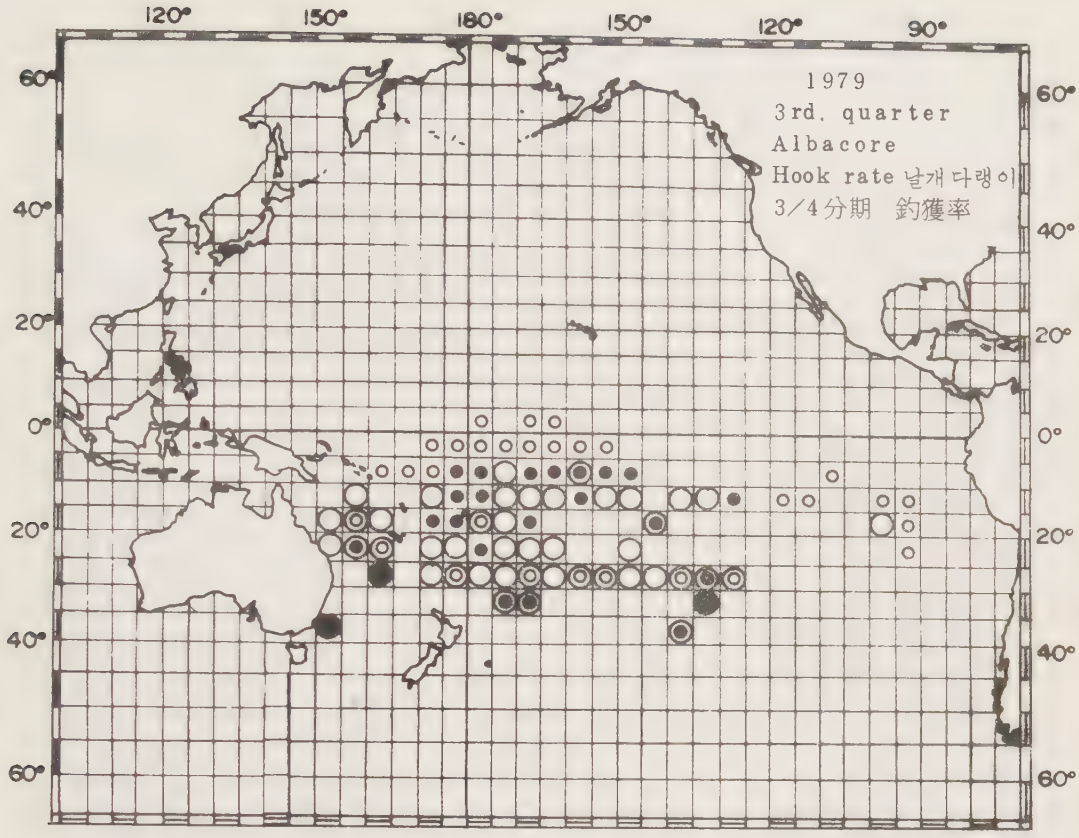
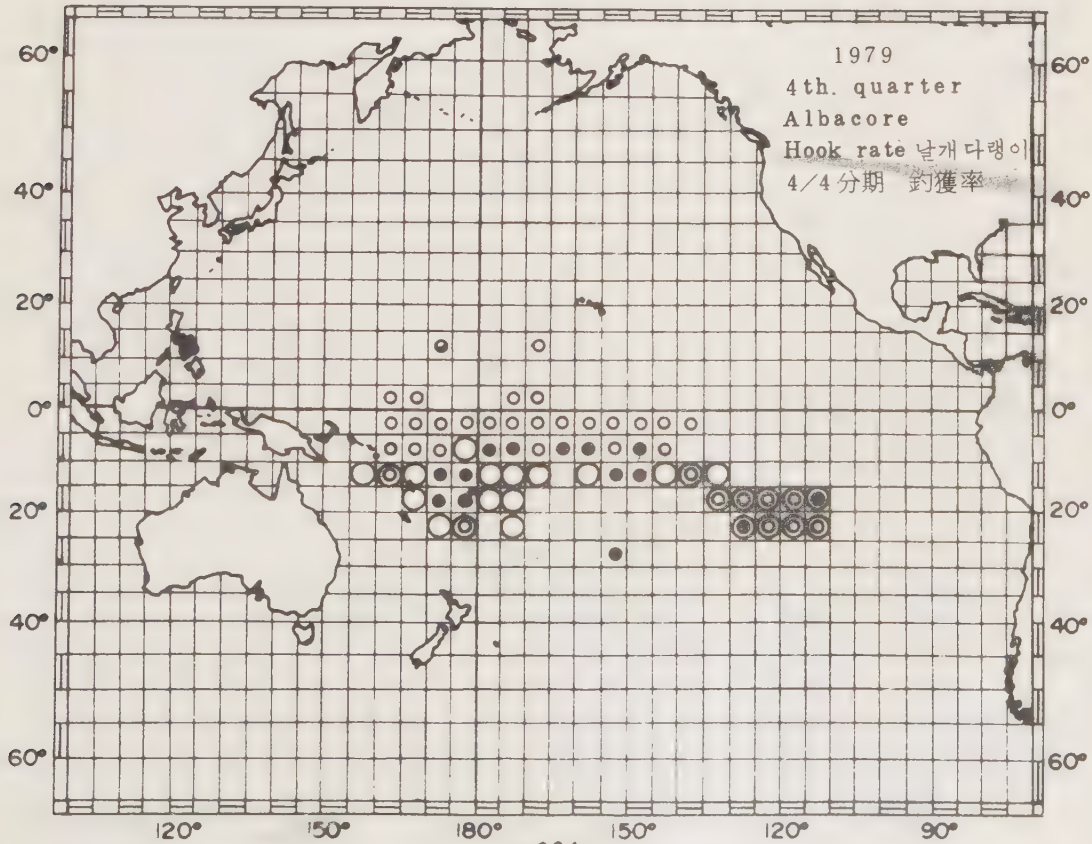
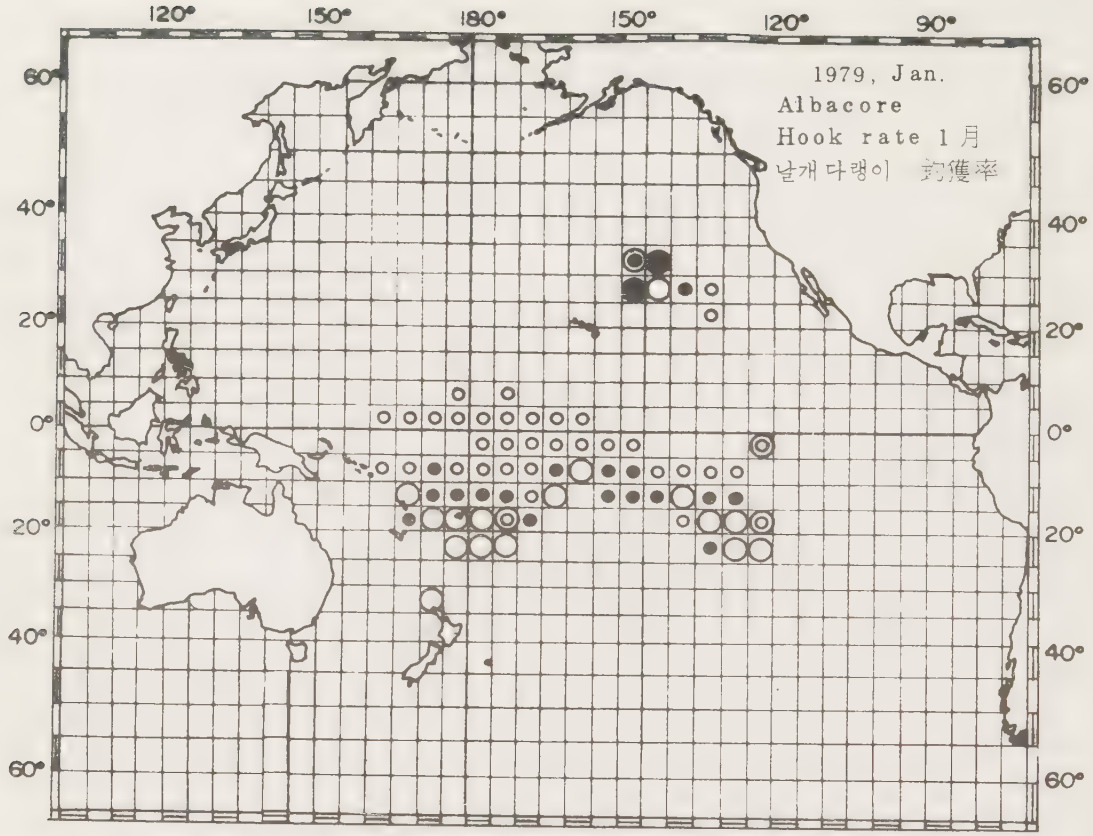
0°
20°
40°
60°
1979
Jan.-Dec.
Albacore
No. of hooks used
날개다랑이 努力量

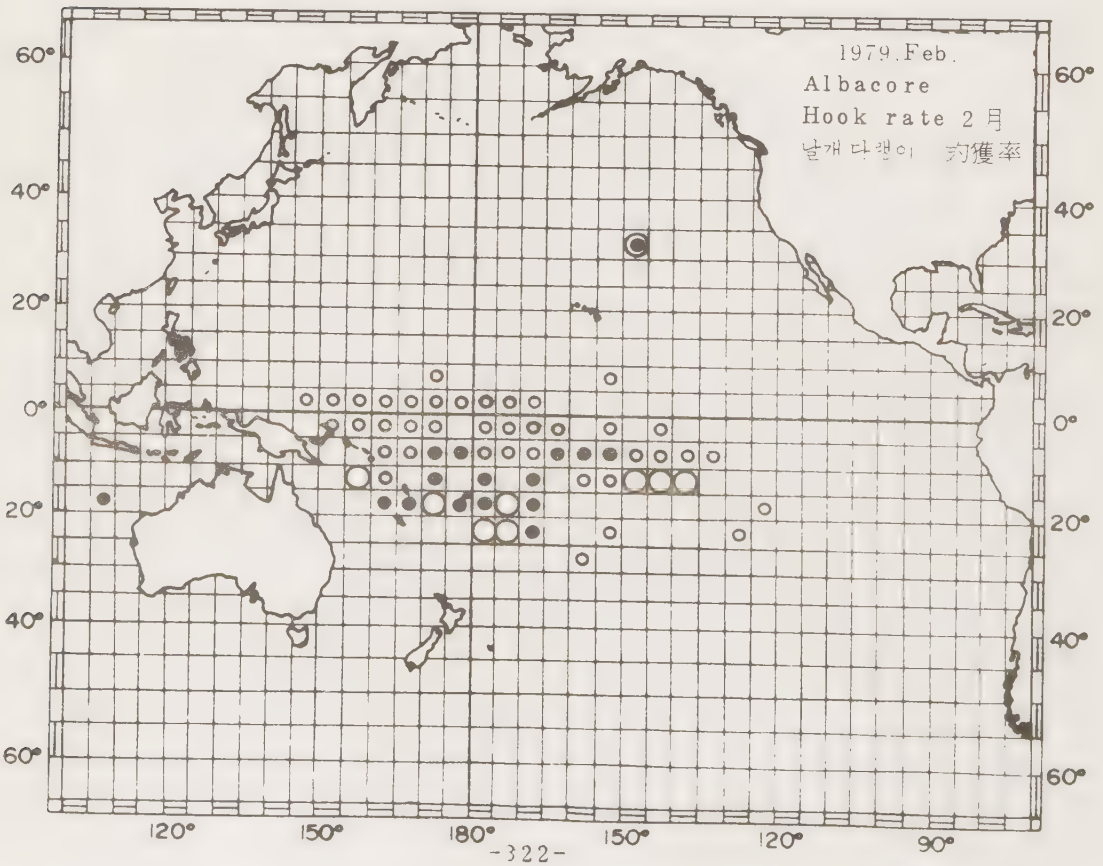

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
1st. quarter
Albacore
Hook rate 날개다랑이
1/4 分期 釣獲率

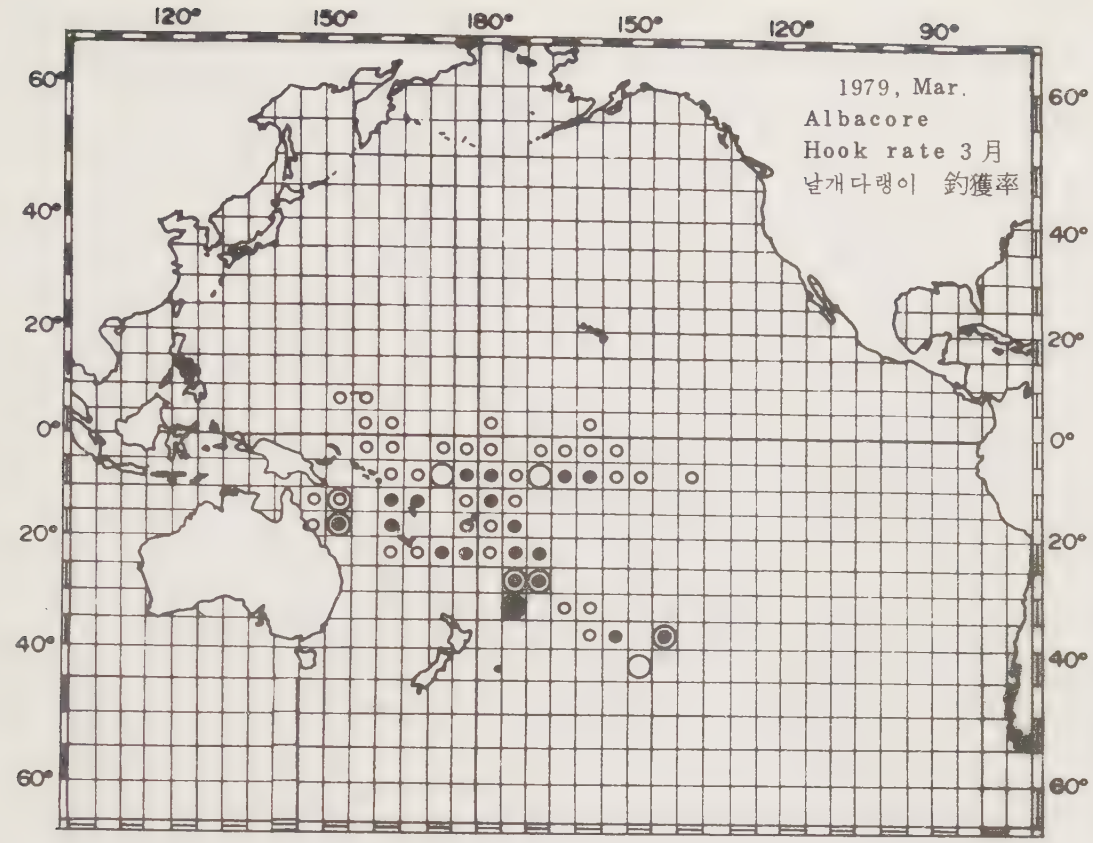

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
2nd. quarter
Albacore
Hook rate 날개다랑이
2/4 分期 釣獲率

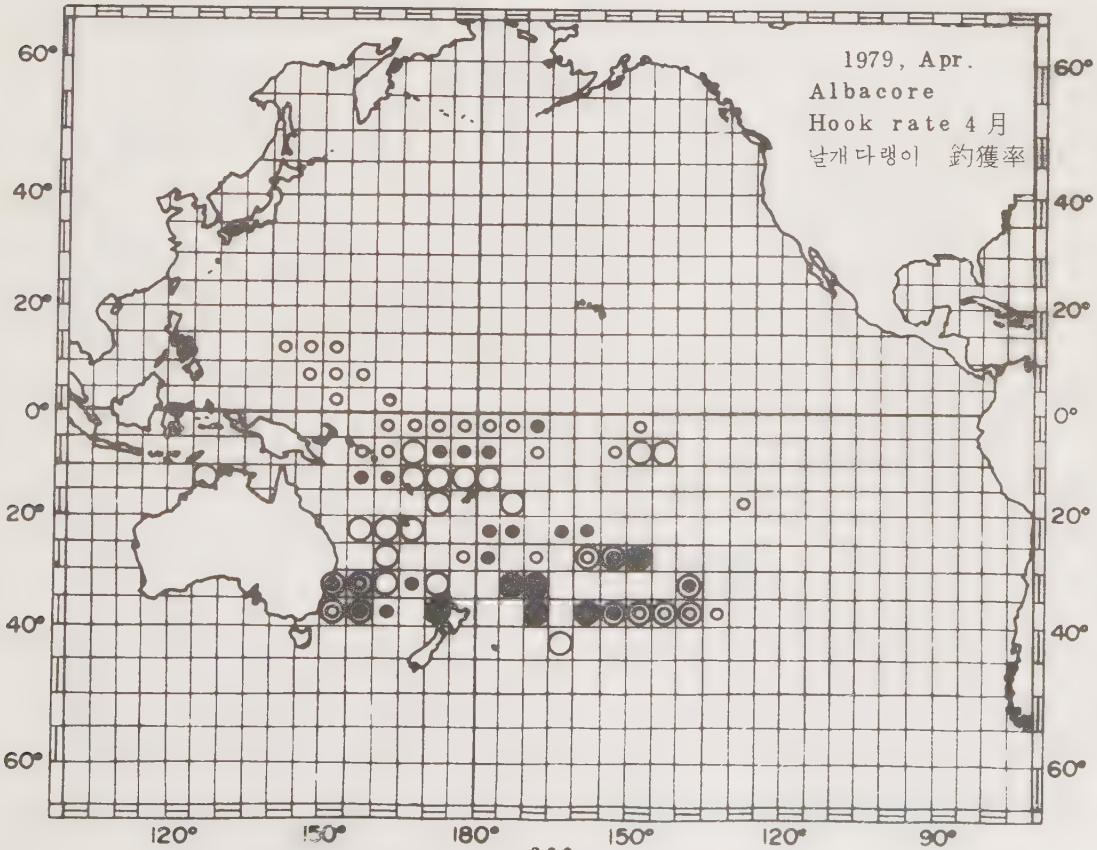

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
3rd. quarter
Albacore
Hook rate 날개다랑이
3/4分期 釣獲率

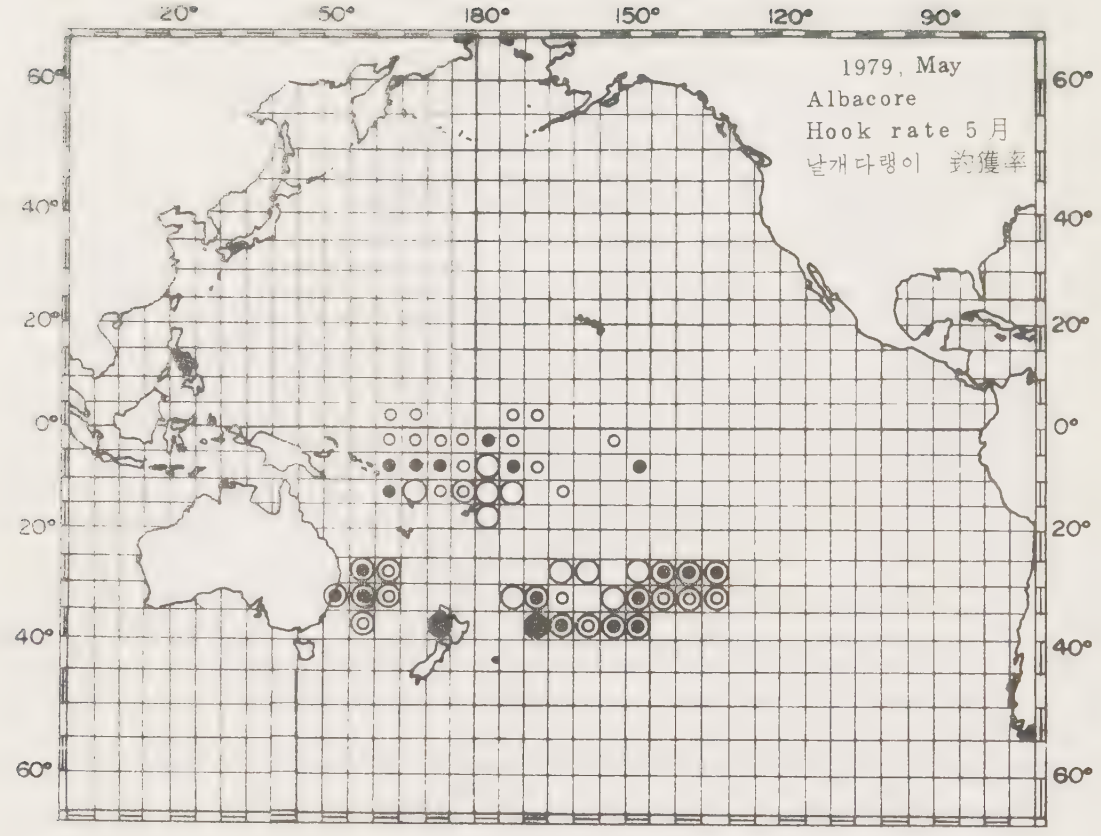

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
4th. quarter
Albacore
Hook rate 날개다랑이
4/4分期 釣獲率

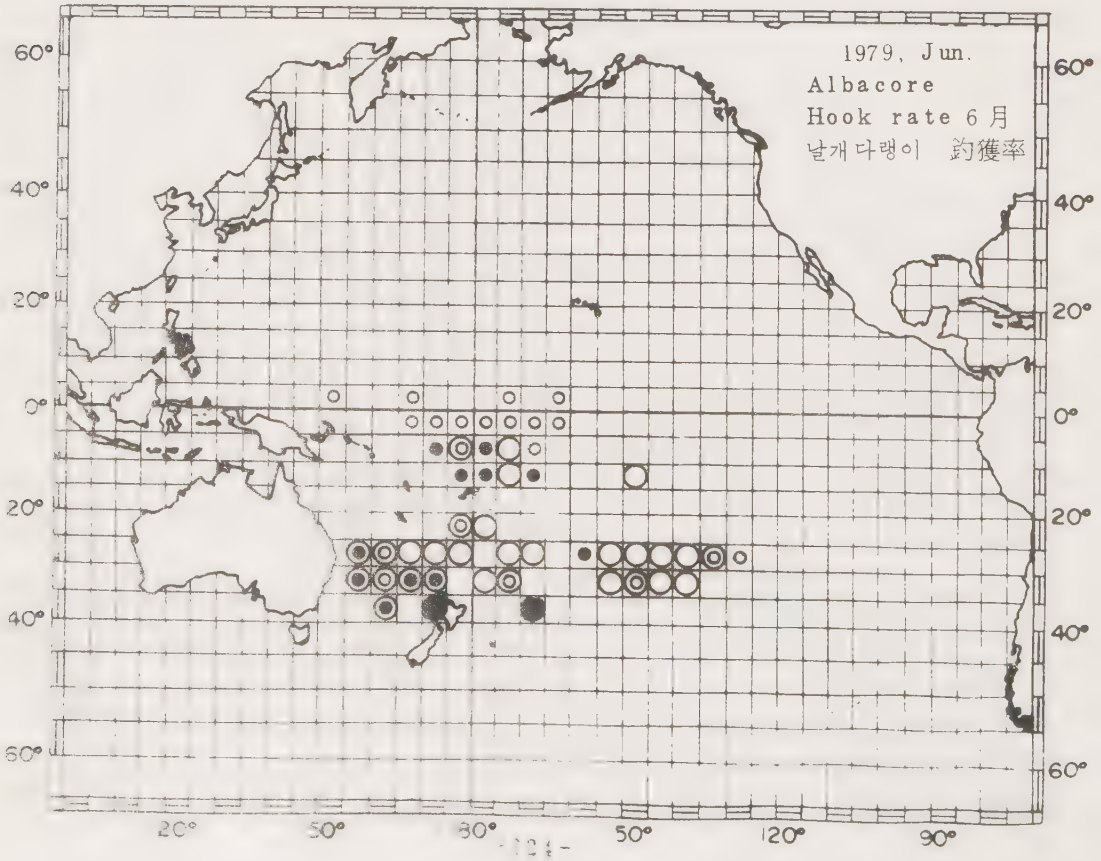

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Jan.
Albacore
Hook rate 1月
날개다랑이 釣獲率

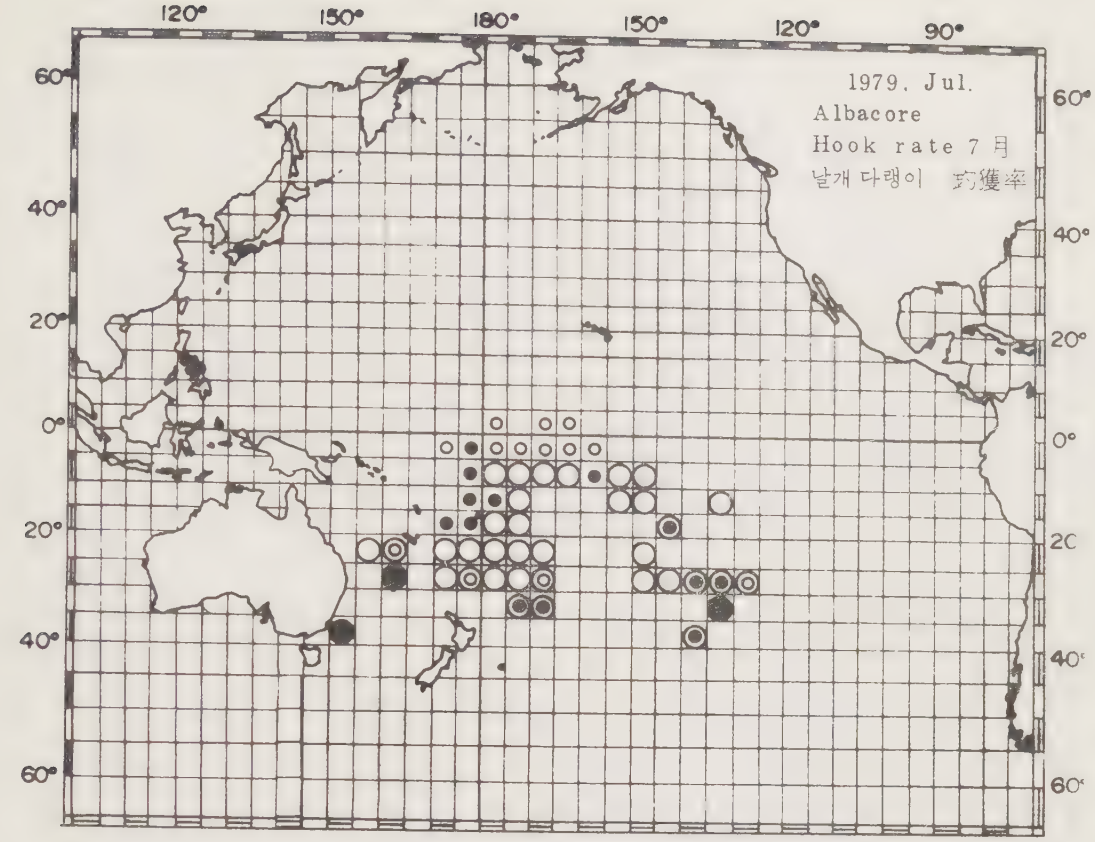

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979.Feb.
Albacore
Hook rate 2月
날개다랑이 釣獲率

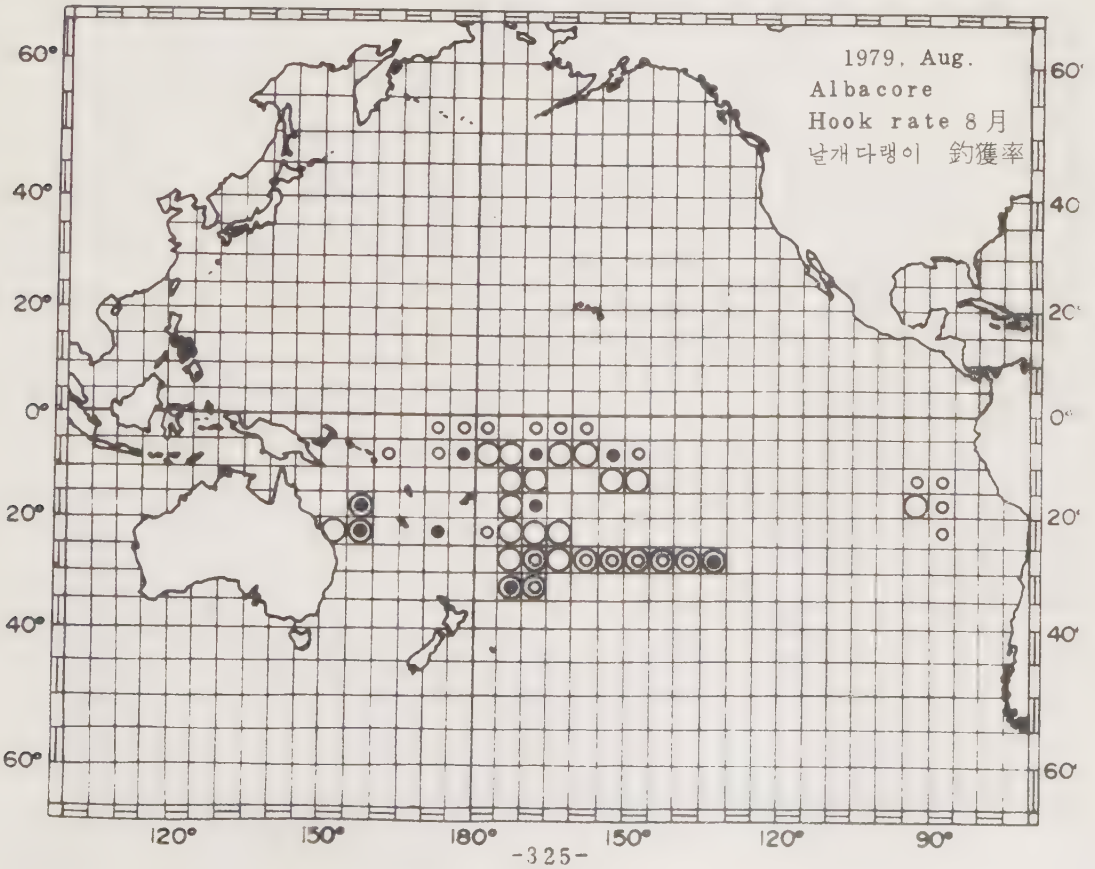

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Mar.
Albacore
Hook rate 3月
날개다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Apr.
Albacore
Hook rate 4月
날개다랑이 釣獲率


20°
50°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, May
Albacore
Hook rate 5月
날개다랑이 釣獲率


60°
40°
20°
0°
20°
40°
60°
1979, Jun.
Albacore
Hook rate 6月
날개다랑이 釣獲率
20°
50°
80°
50°
120°
90°


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979. Jul.
Albacore
Hook rate 7月
날개다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
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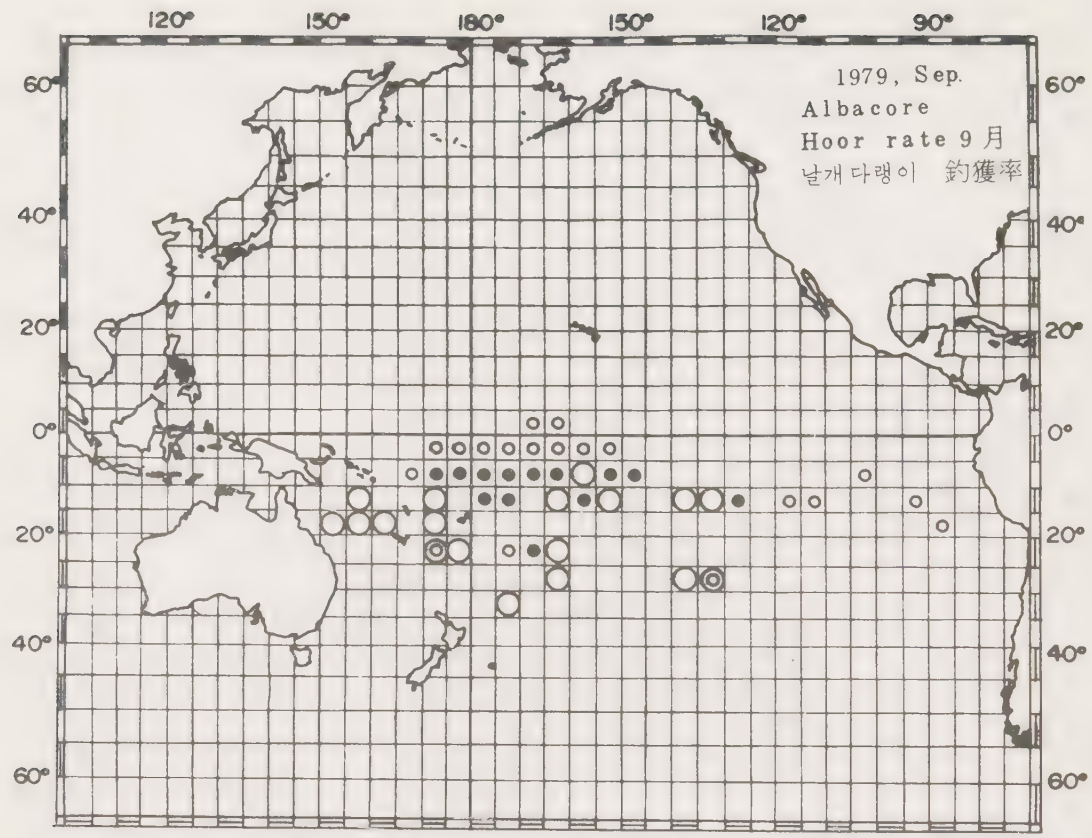
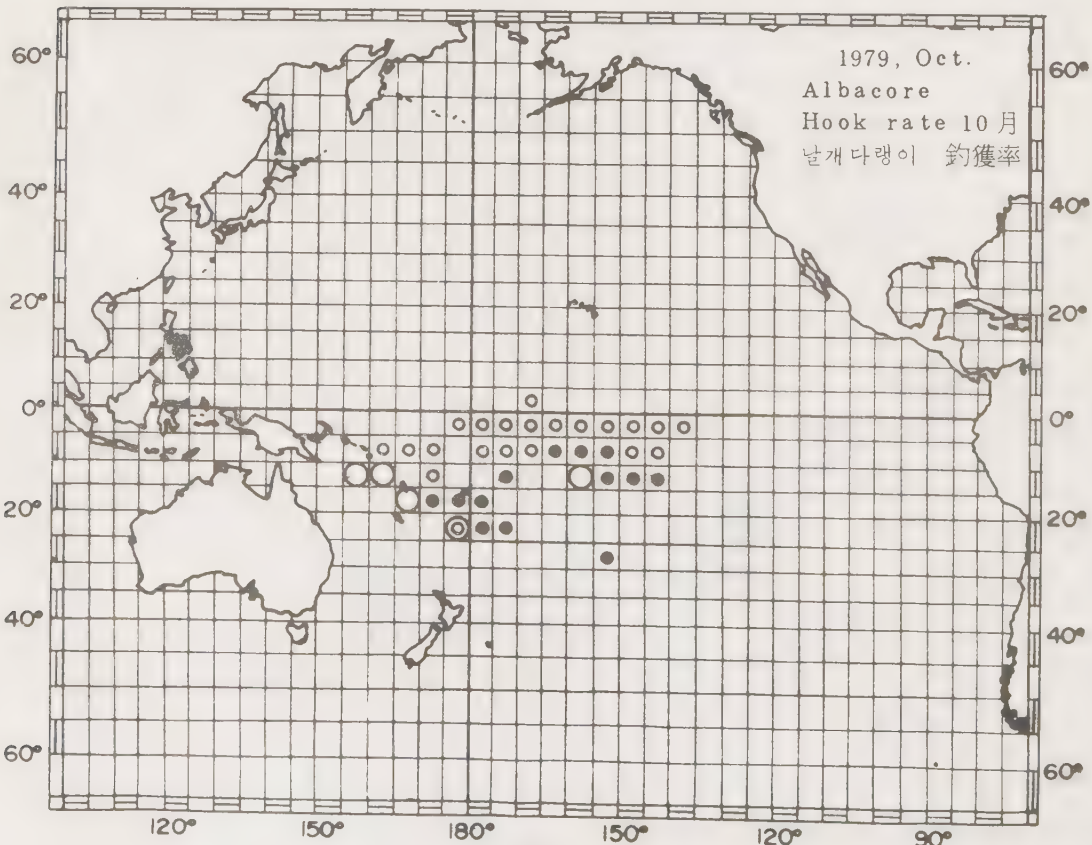
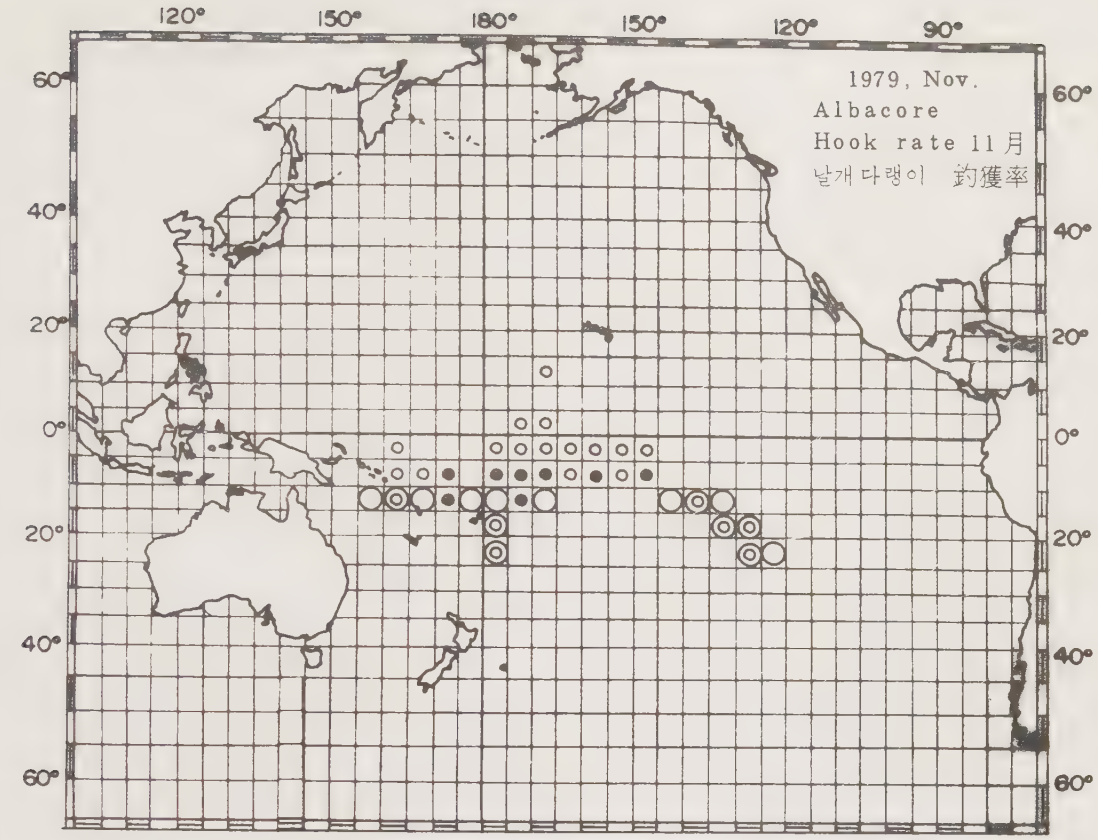
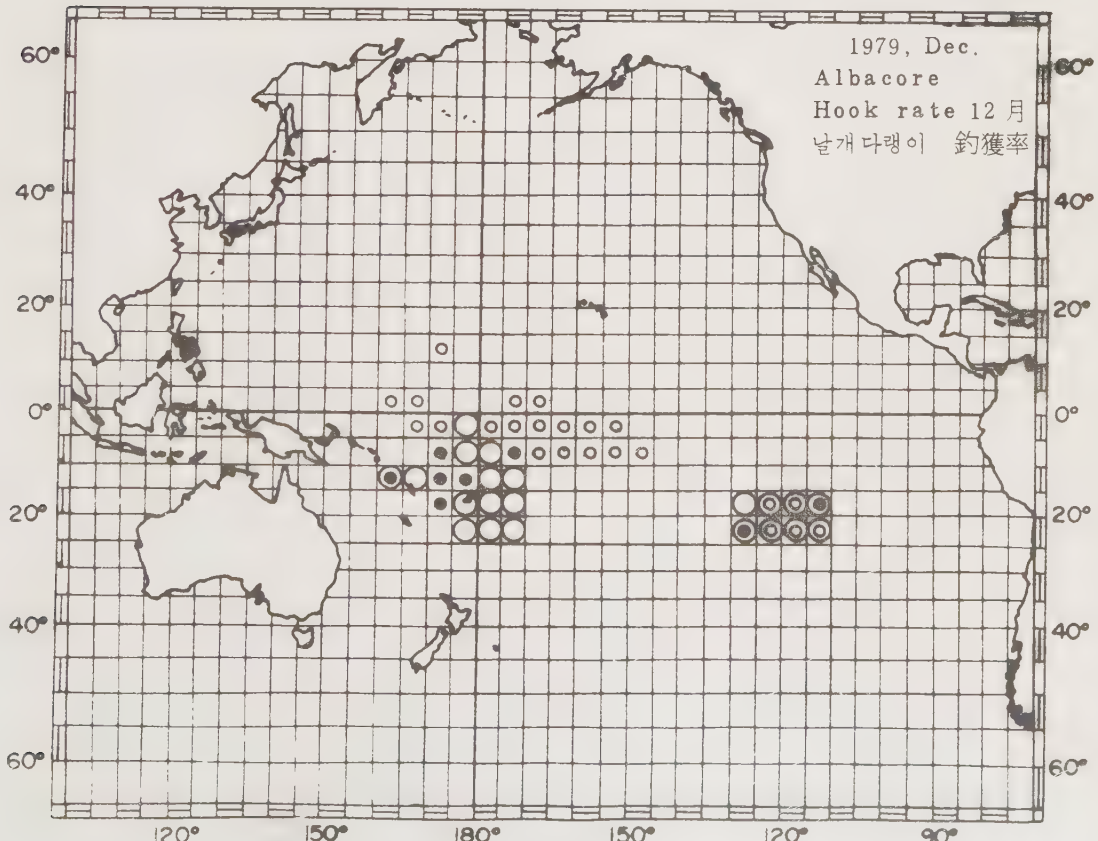
20°
40°
60°
1979. Aug.
Albacore
Hook rate 8月
날개다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Sep.
Albacore
Hoor rate 9月
날개다랑이 釣獲率

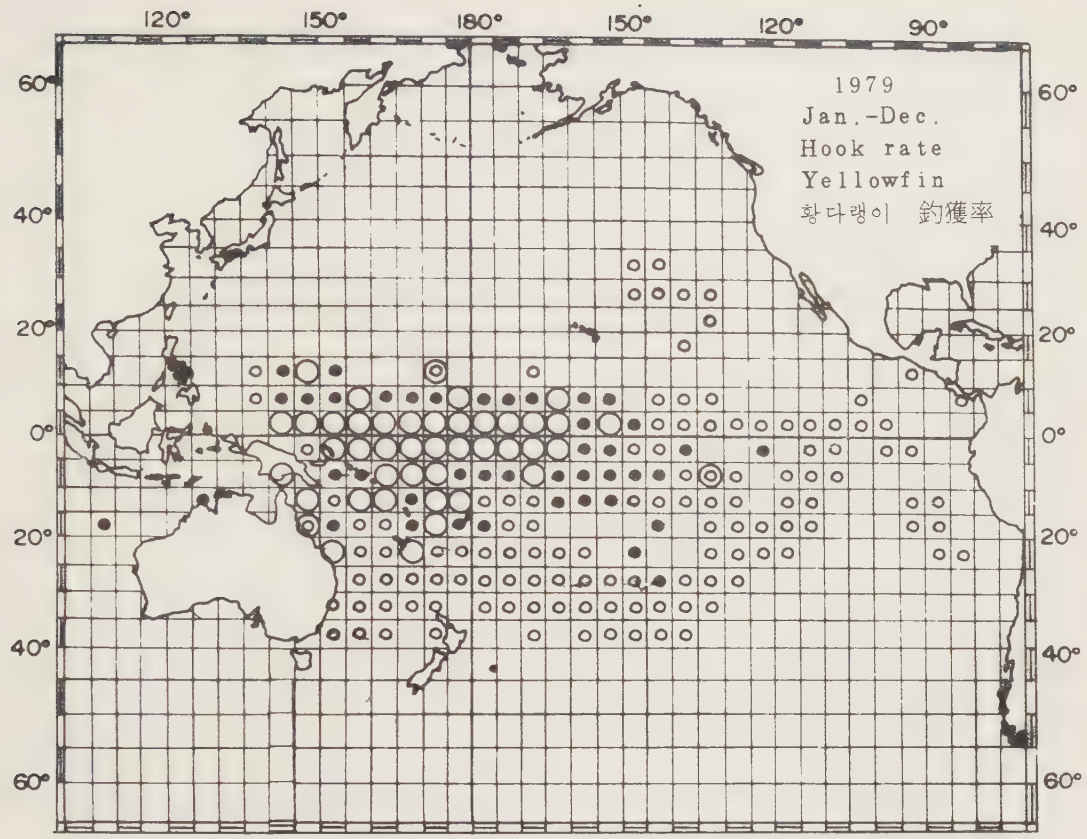

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Oct.
Albacore
Hook rate 10月
날개다랑이 釣獲率

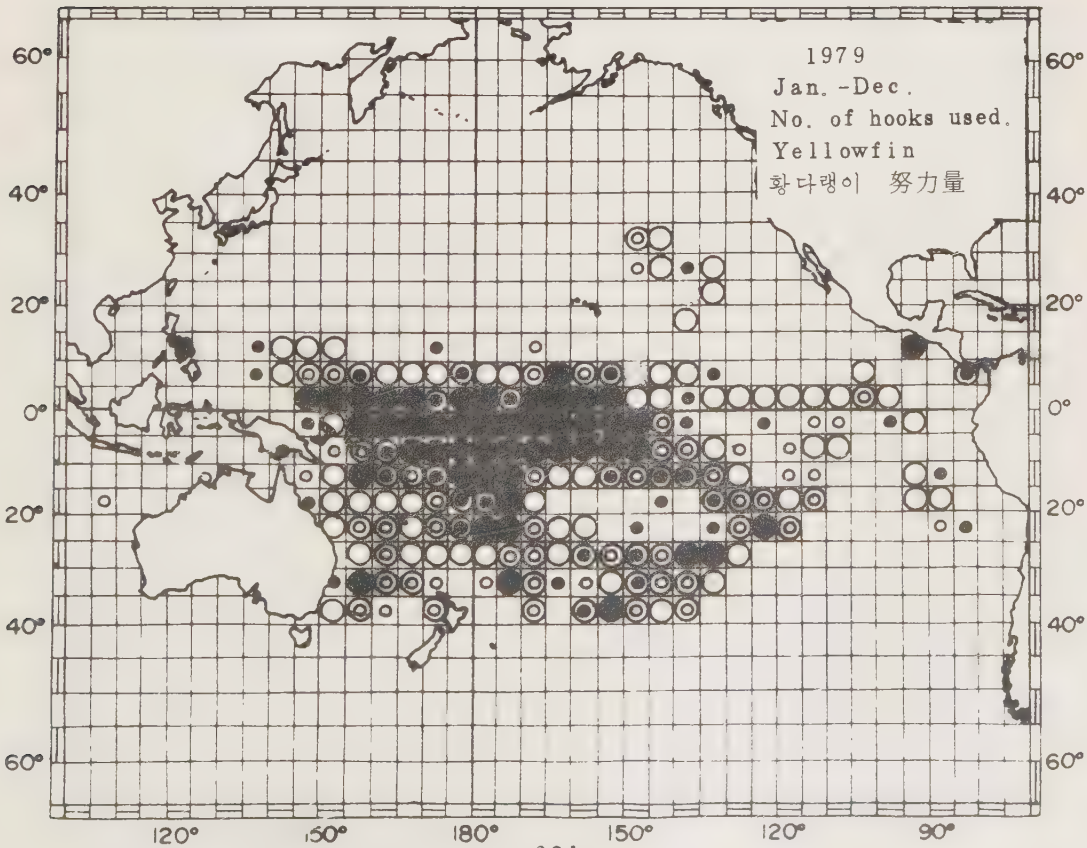

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Nov.
Albacore
Hook rate 11月
날개다랑이 釣獲率

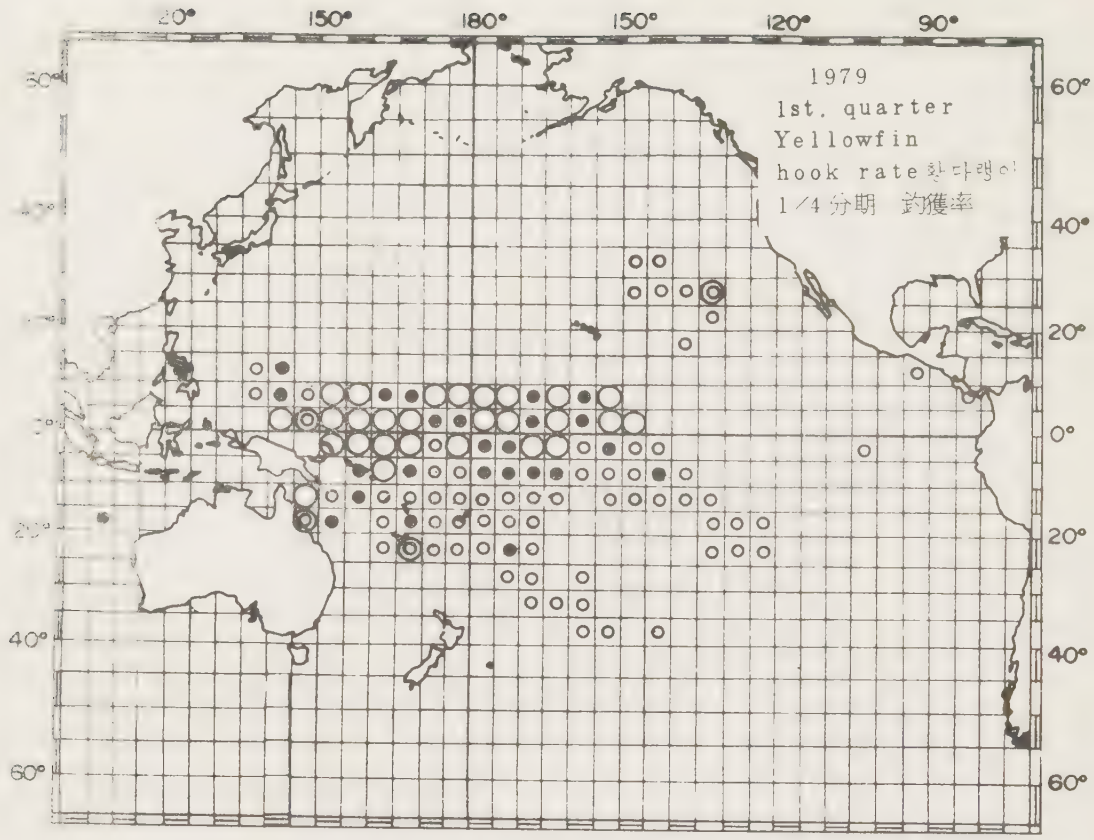

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Dec.
Albacore
Hook rate 12月
날개다랑이 釣獲率

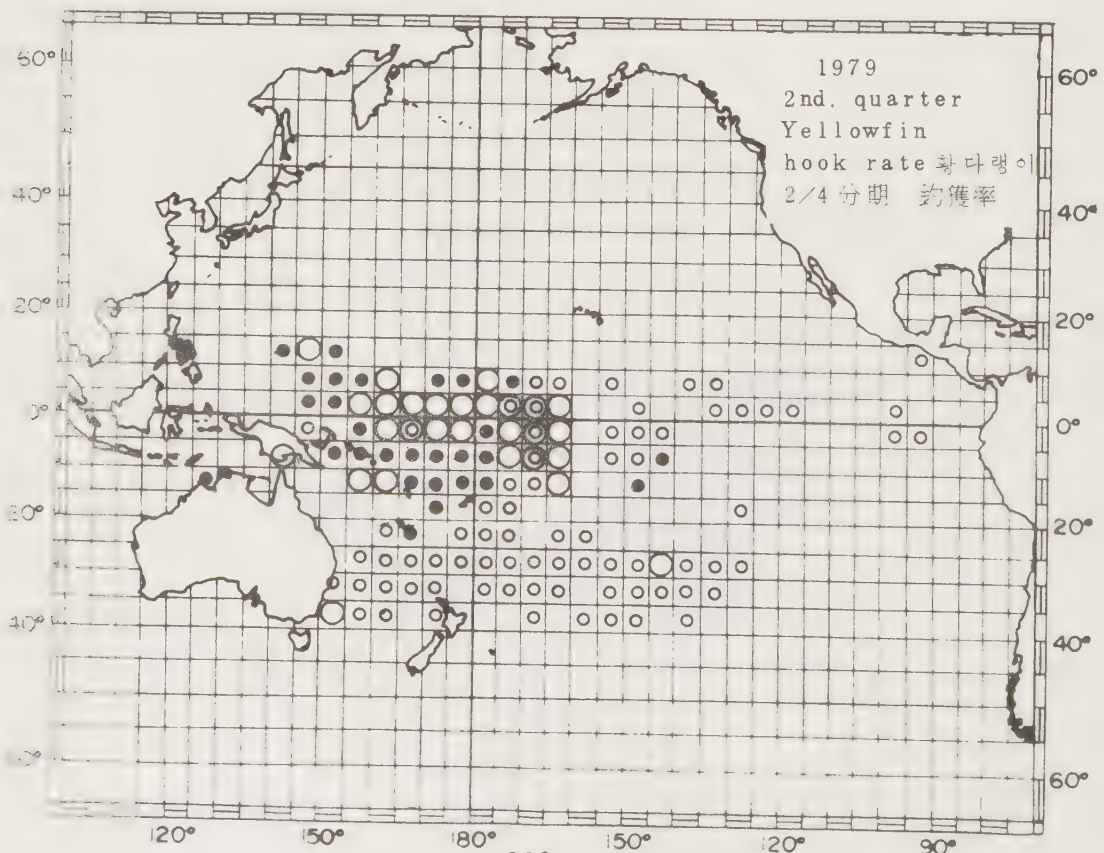
황 다 랭 이

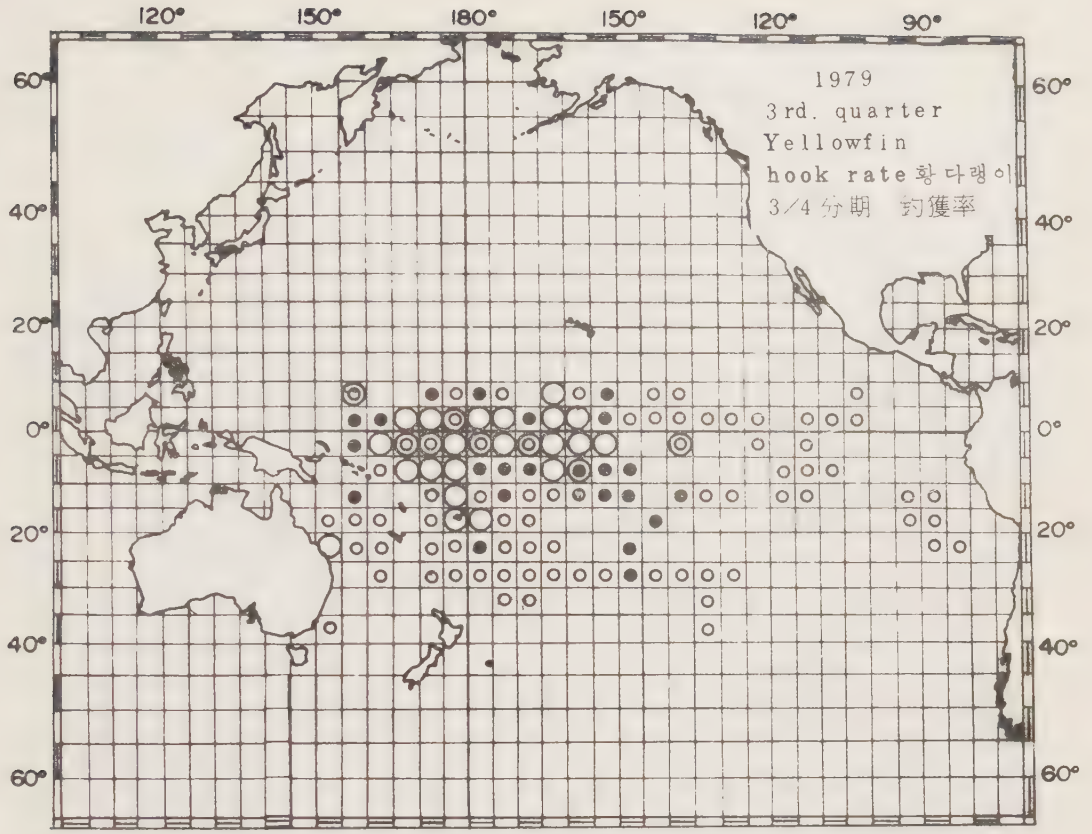
Yellowfin


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
Jan.-Dec.
Hook rate
Yellowfin
황다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
Jan.-Dec.
No. of hooks used.
Yellowfin
황다랑이 努力量


1979
1st. quarter
Yellowfin
hook rate황다랑이
1/4分期 釣獲率


1979
2nd. quarter
Yellowfin
hook rate황다랑이
2/4分期 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
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0°
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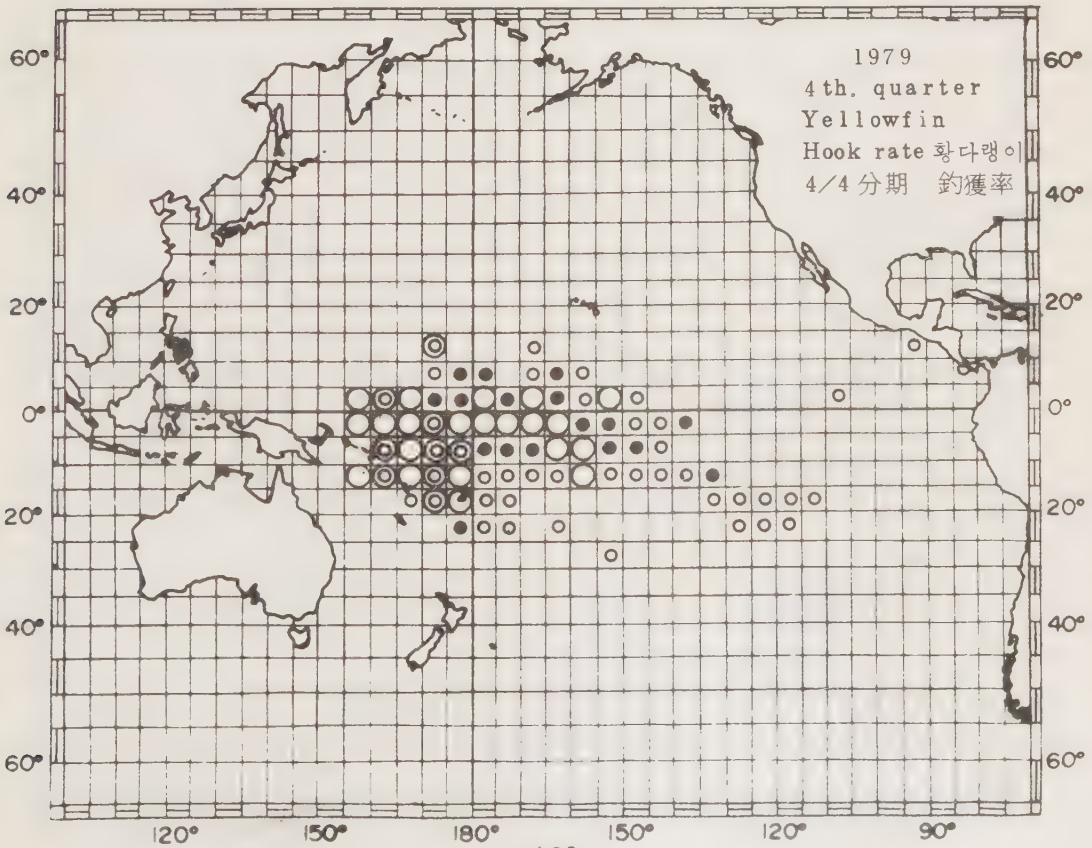
40°
60°
1979
3rd. quarter
Yellowfin
hook rate 황다랑이
3/4 分期 釣獲率


120°
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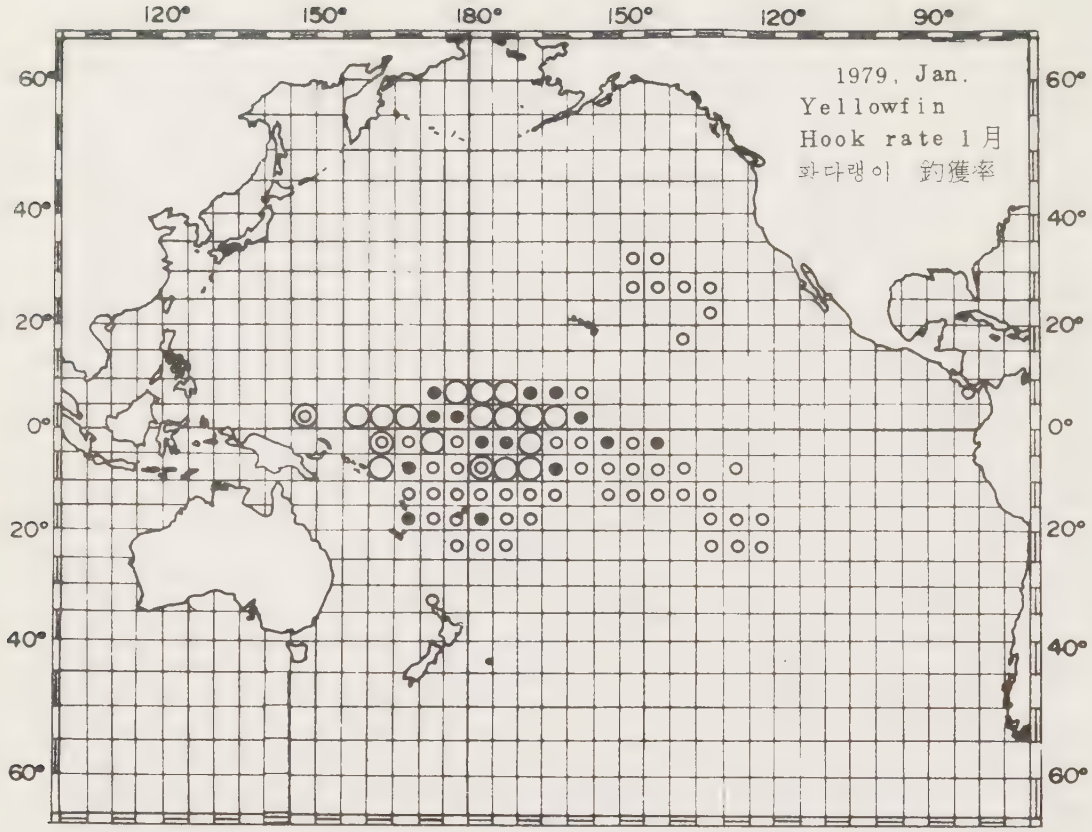
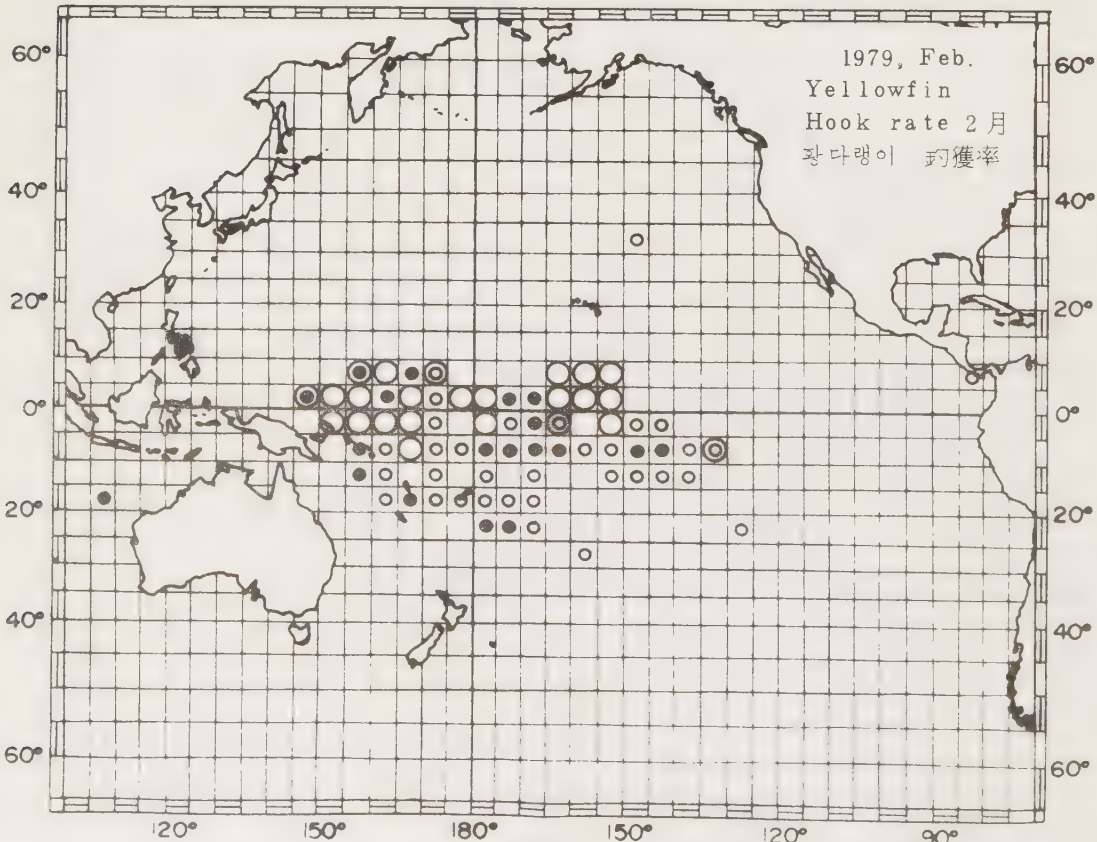
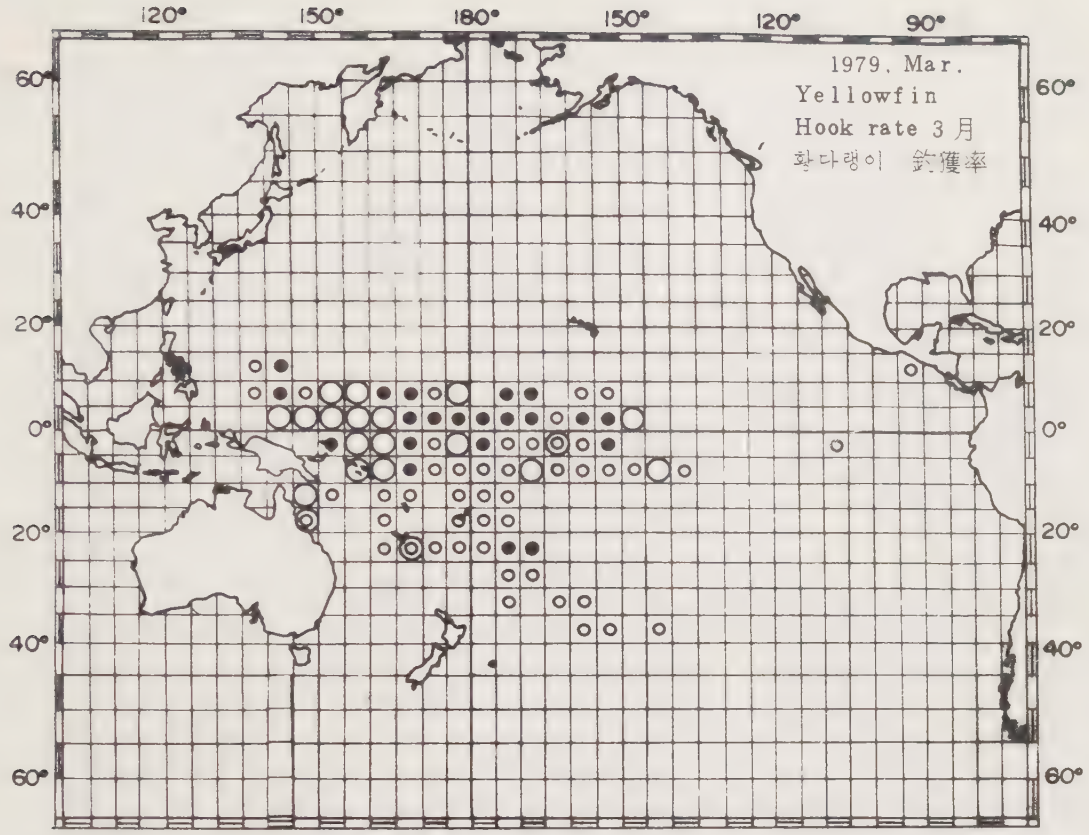
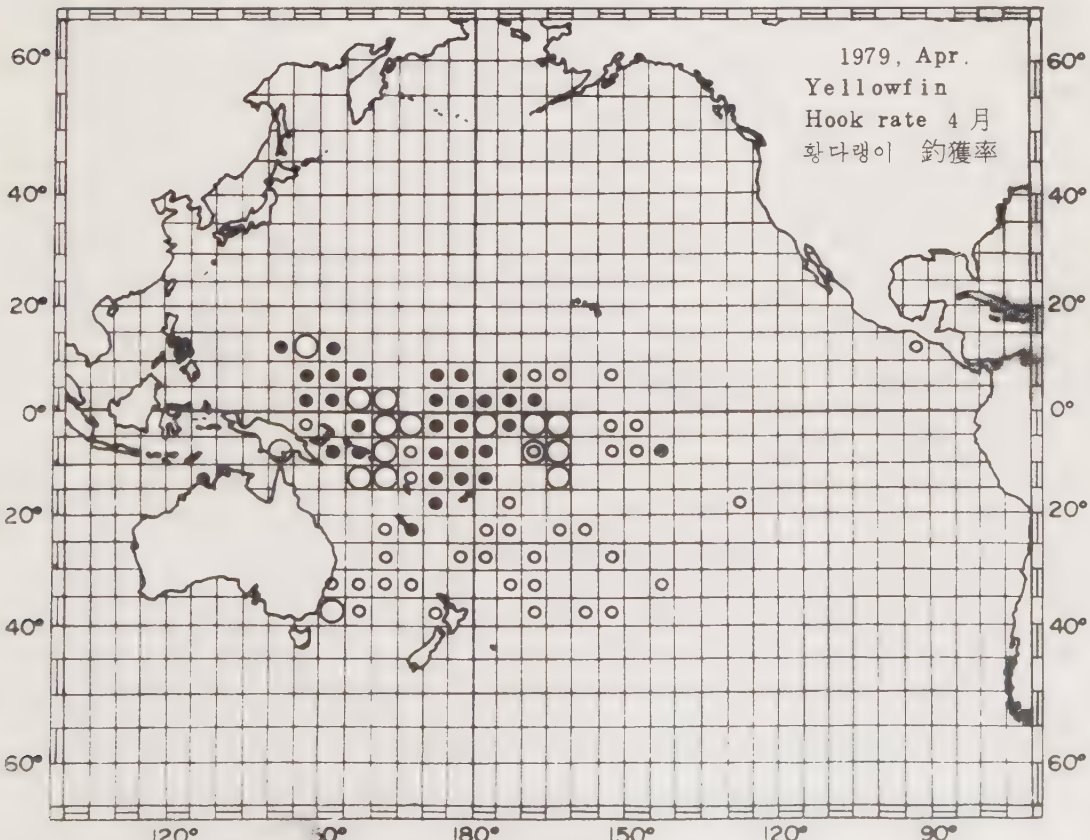
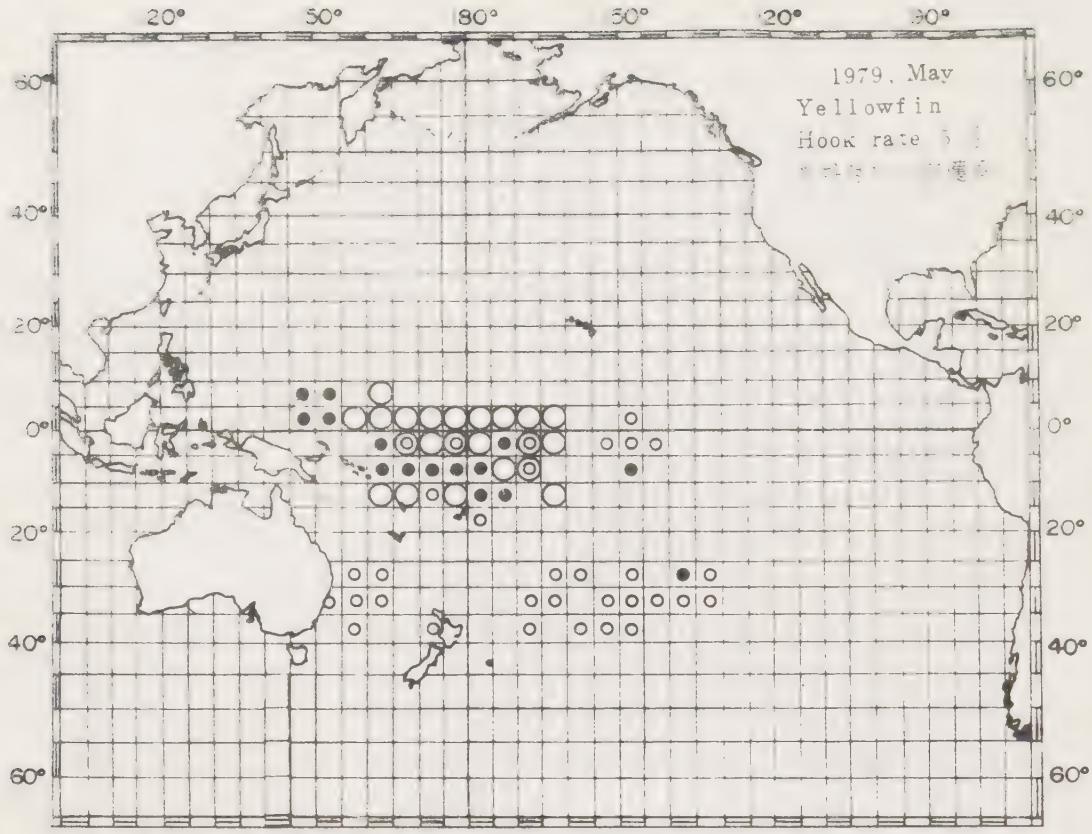
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
4th. quarter
Yellowfin
Hook rate 황다랑이
4/4 分期 釣獲率


120° 150° 180° 150° 120° 90°
60° 40° 20° 0° 20° 40° 60°
1979, Jan.
Yellowfin
Hook rate 1月
황다랑이 釣獲率


1979, Feb.
Yellowfin
Hook rate 2月
황다랑이 釣獲率
120° 150° 180° 150° 120° 90°
60° 40° 20° 0° 20° 40° 60°


120° 150° 180° 150° 120° 90°
60° 40° 20° 0° 20° 40° 60°
1979, Mar.
Yellowfin
Hook rate 3月
황다랭이 釣獲率


60° 40° 20° 0° 20° 40° 60°
1979, Apr.
Yellowfin
Hook rate 4月
황다랭이 釣獲率
120° 150° 180° 150° 120° 90°


1979, May
Yellowfin
Hook rate 5 月
20°
50°
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120°
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60°
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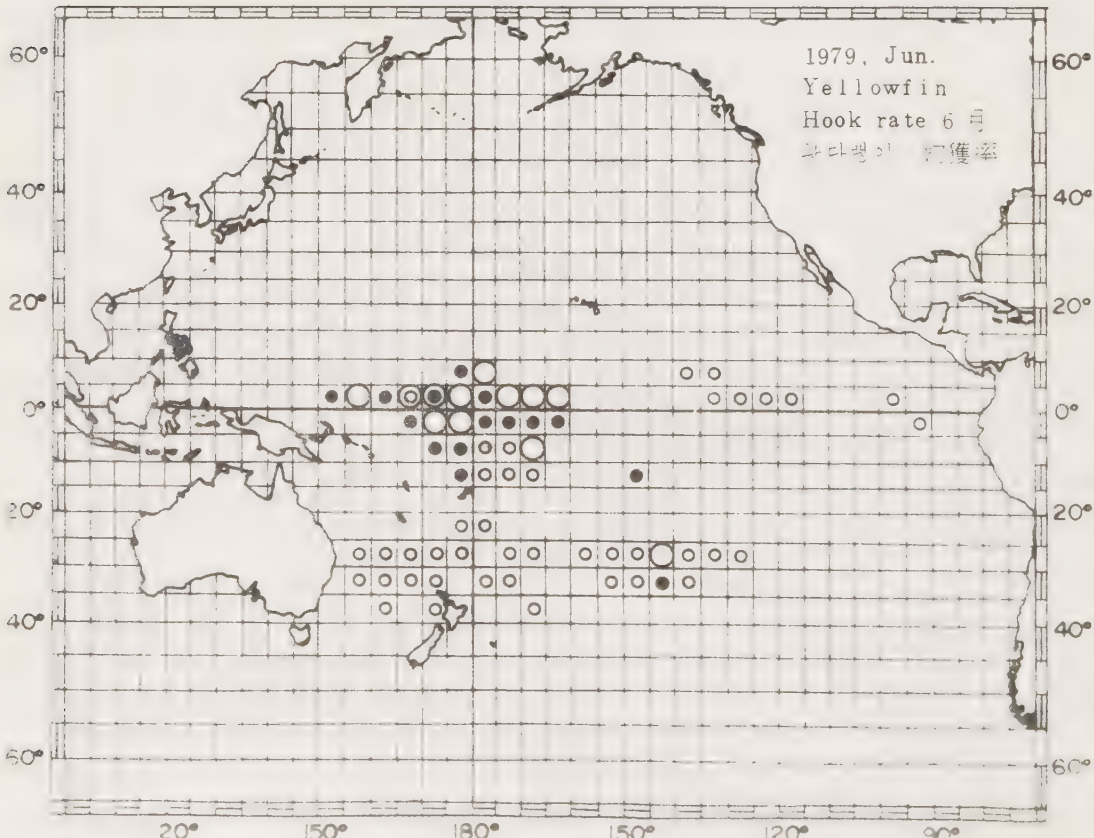
60°


1979, Jun.
Yellowfin
Hook rate 6 月
20°
150°
180°
150°
120°
90°
60°
40°
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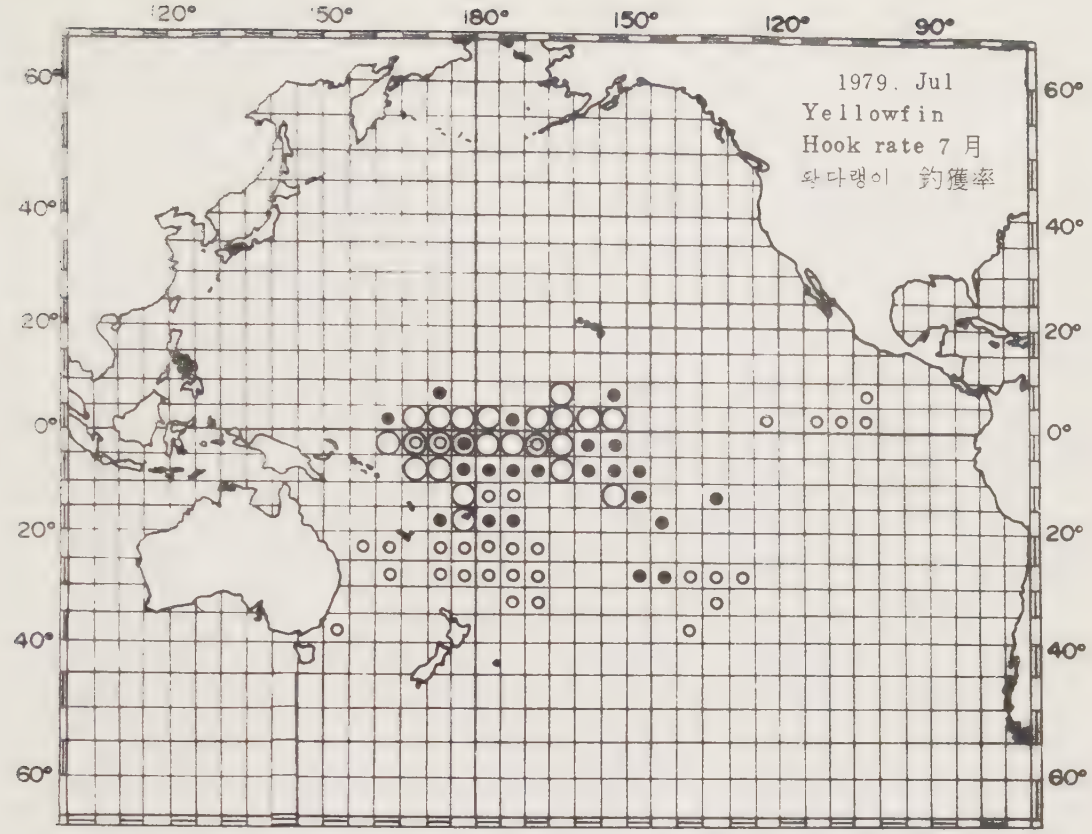
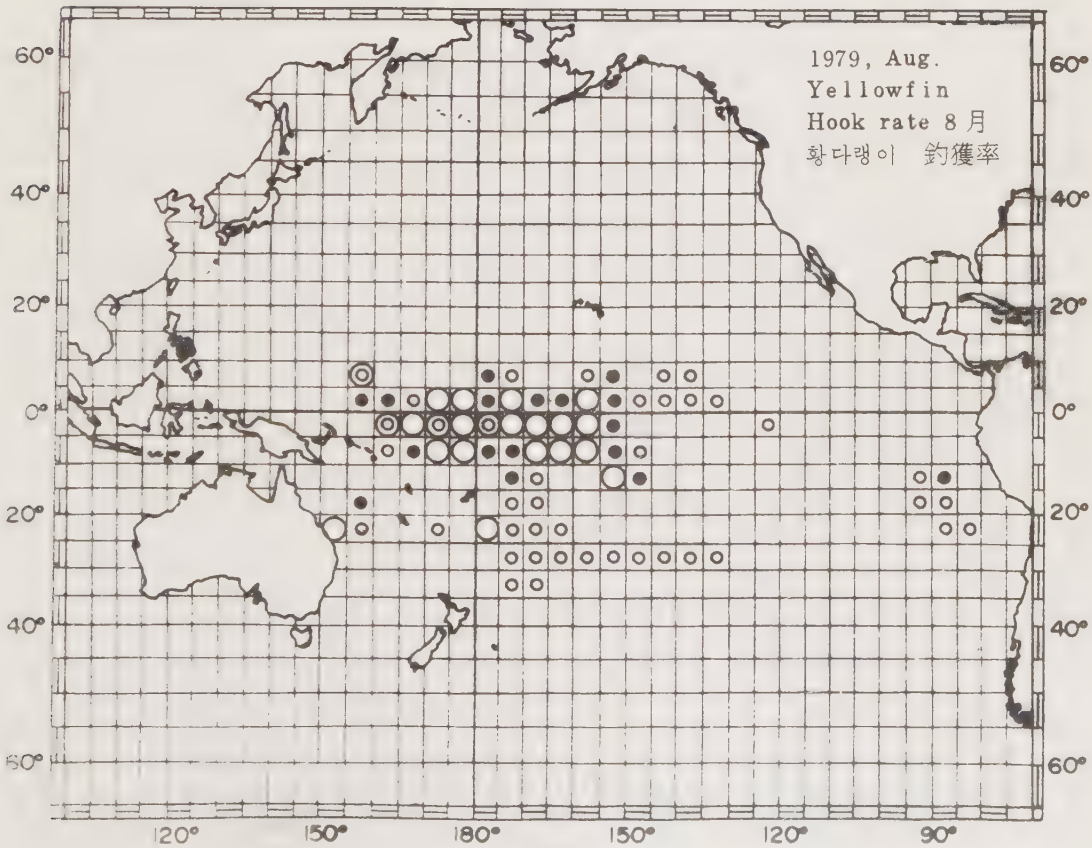
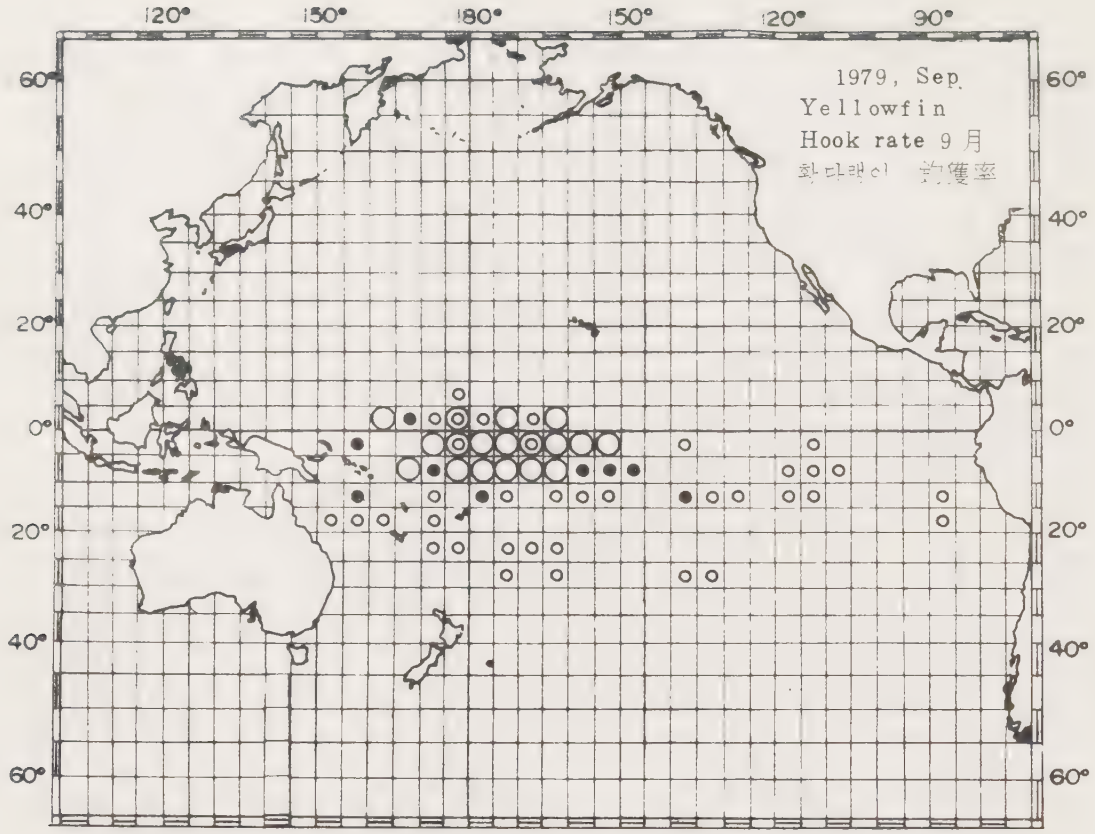
20°
40°
60°


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979. Jul
Yellowfin
Hook rate 7 月
황다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Aug.
Yellowfin
Hook rate 8 月
황다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
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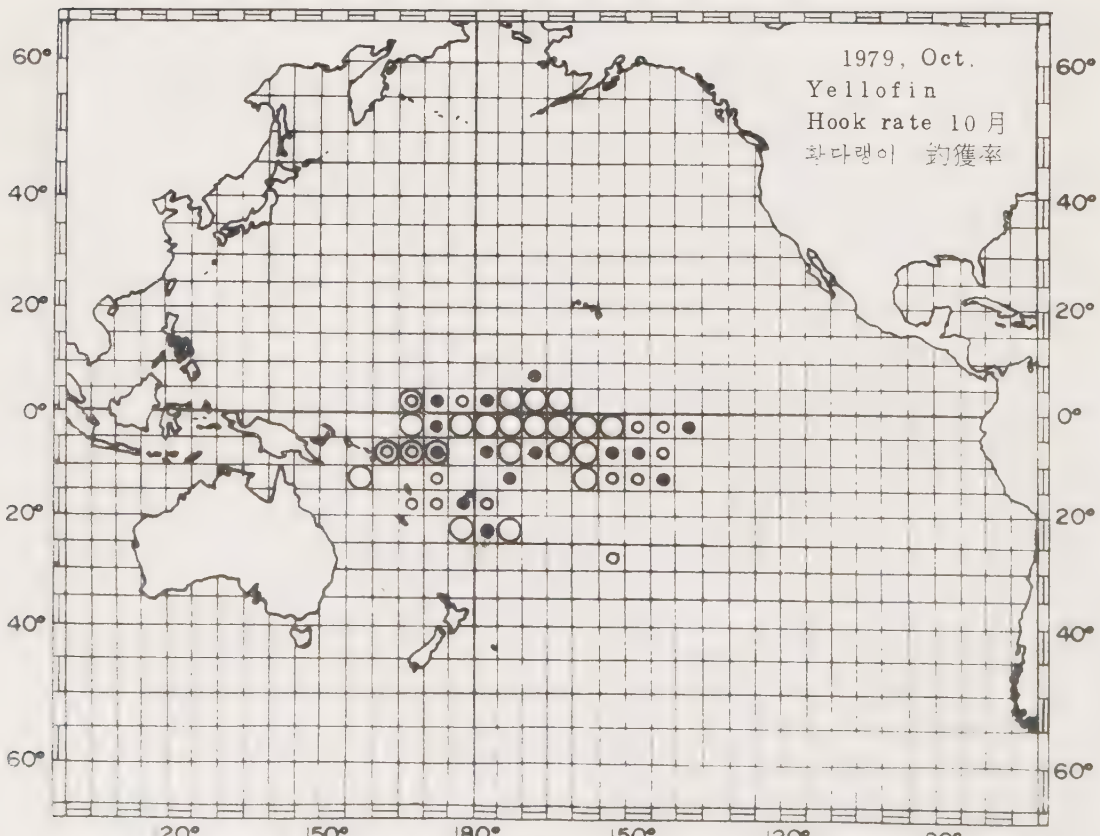
0°
20°
40°
60°
1979, Sep.
Yellowfin
Hook rate 9月
황다랑이 釣獲率


120°
150°
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120°
90°
60°
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0°
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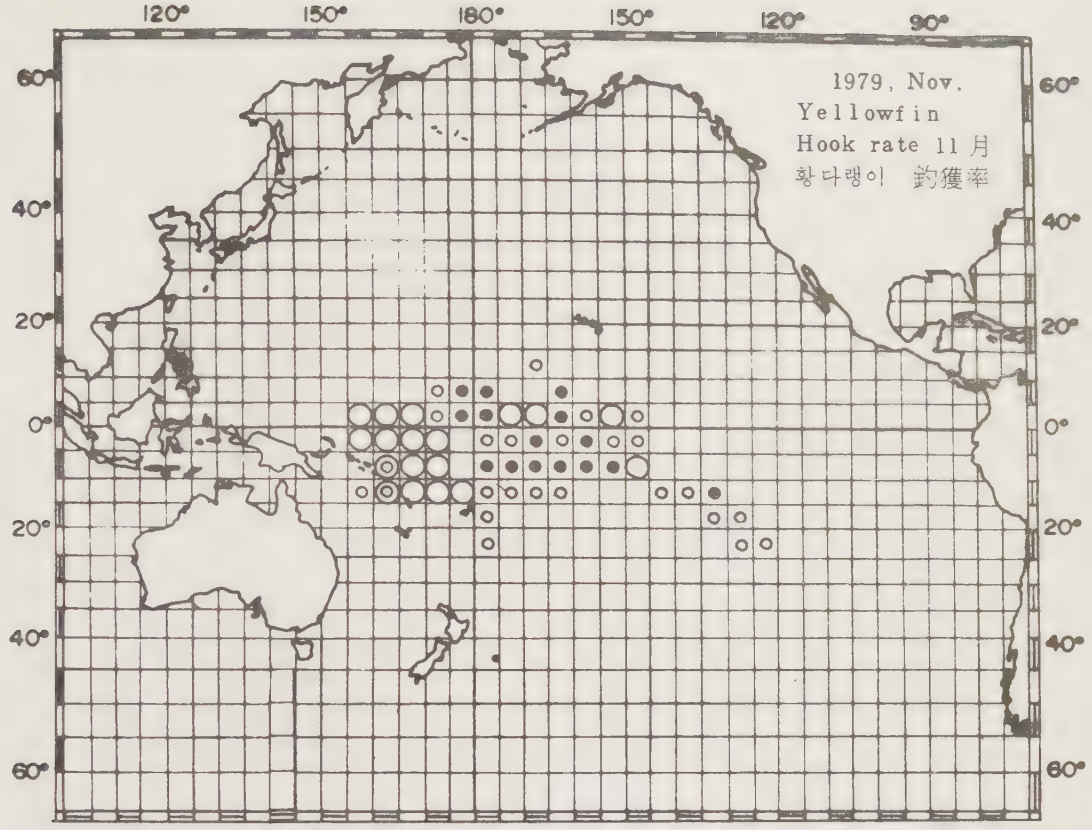
60°
1979, Oct.
Yellofin
Hook rate 10月
황다랑이 釣獲率


120°
150°
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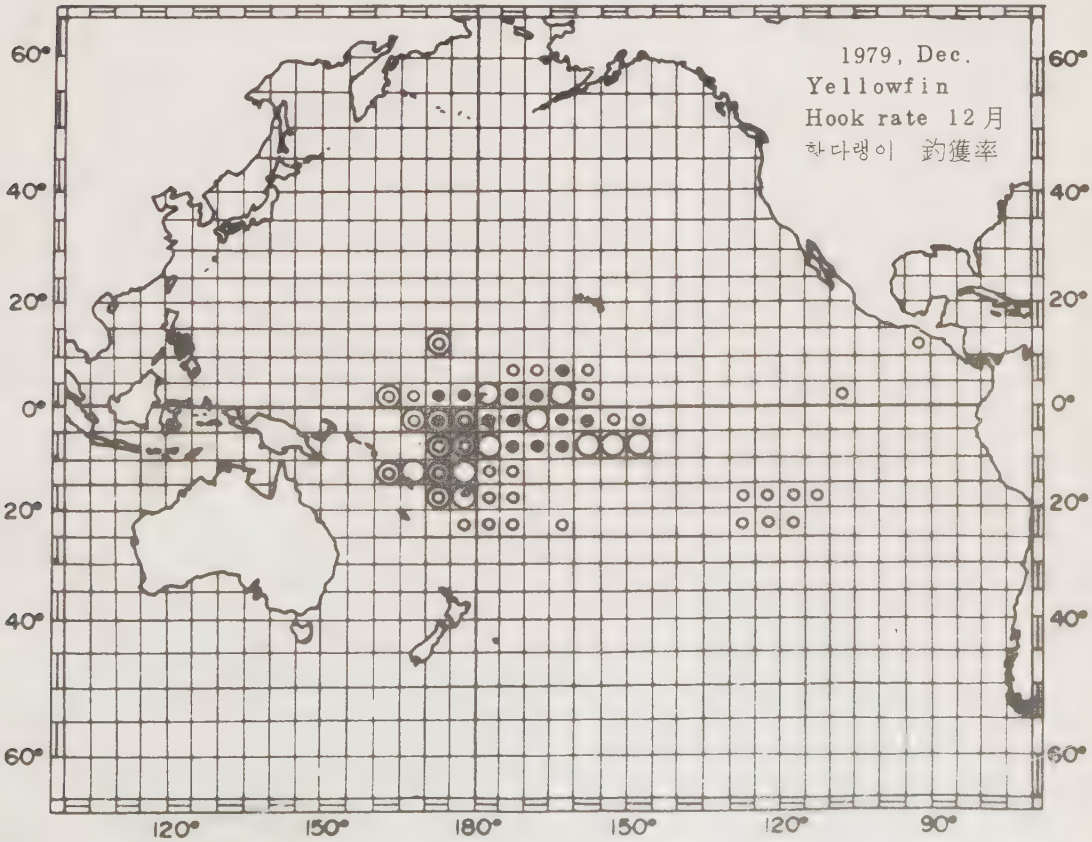
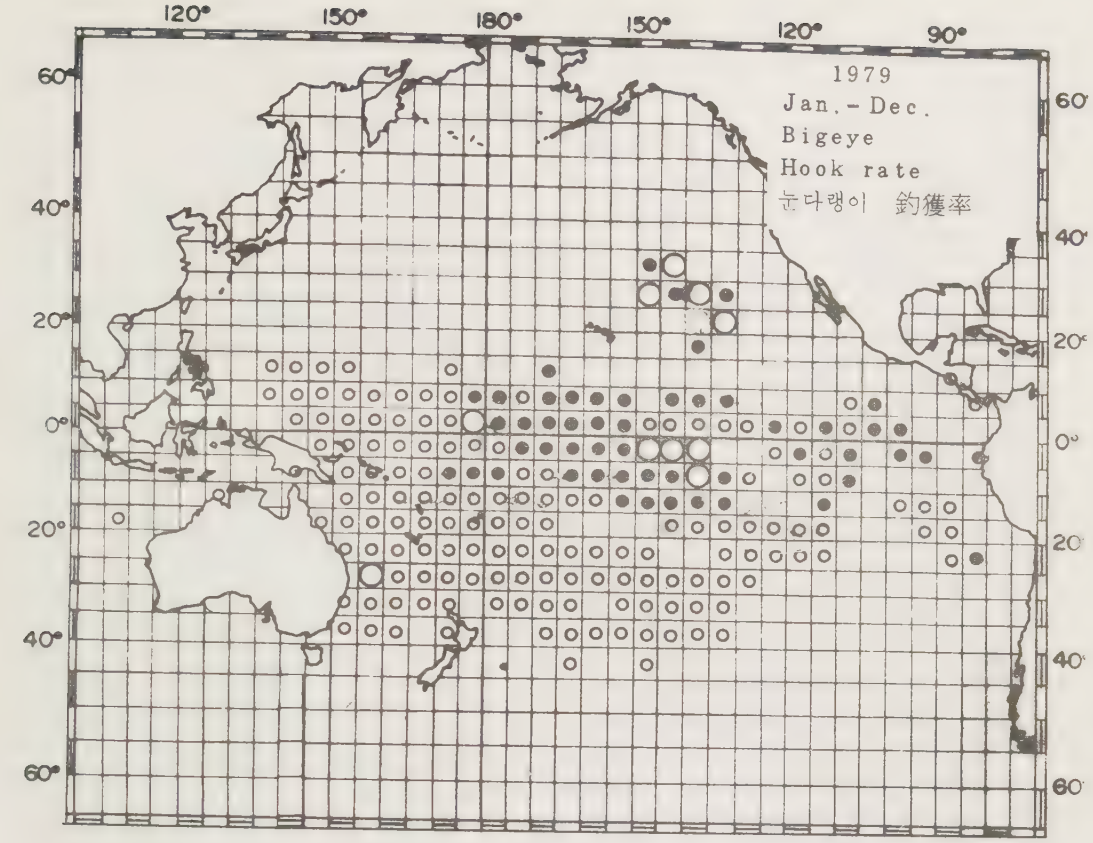
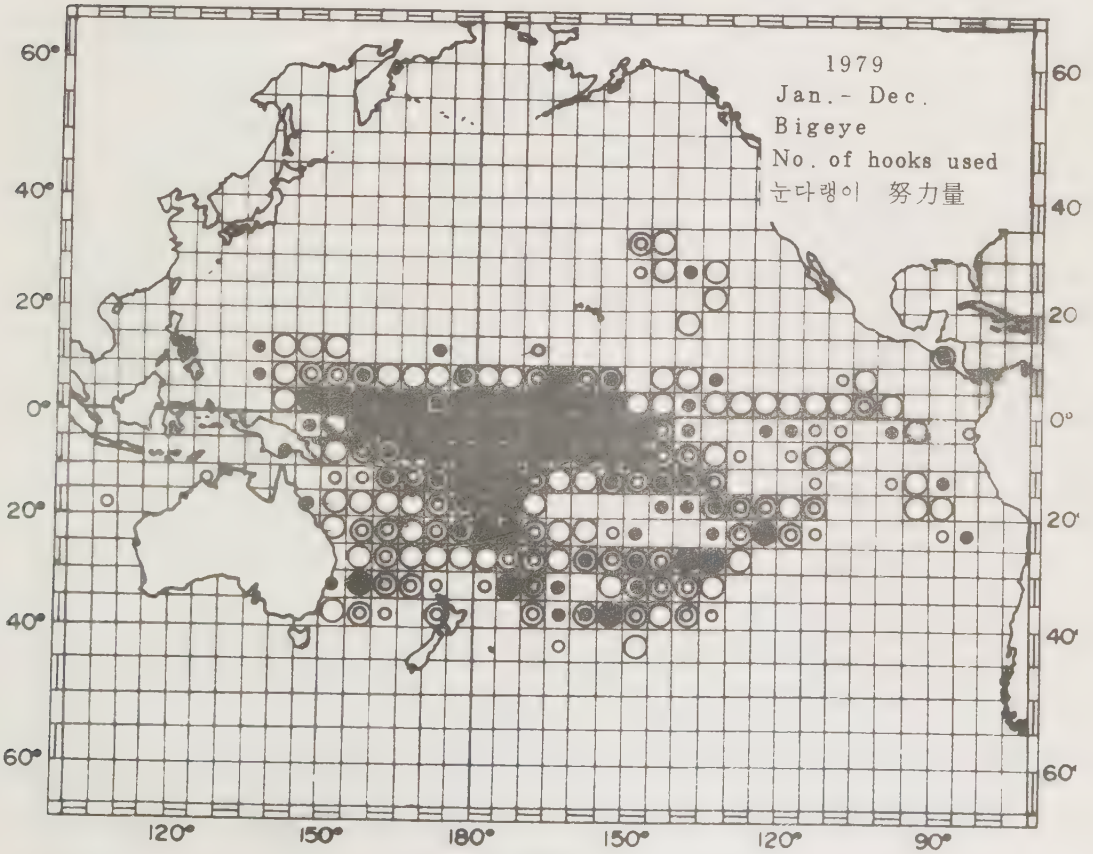
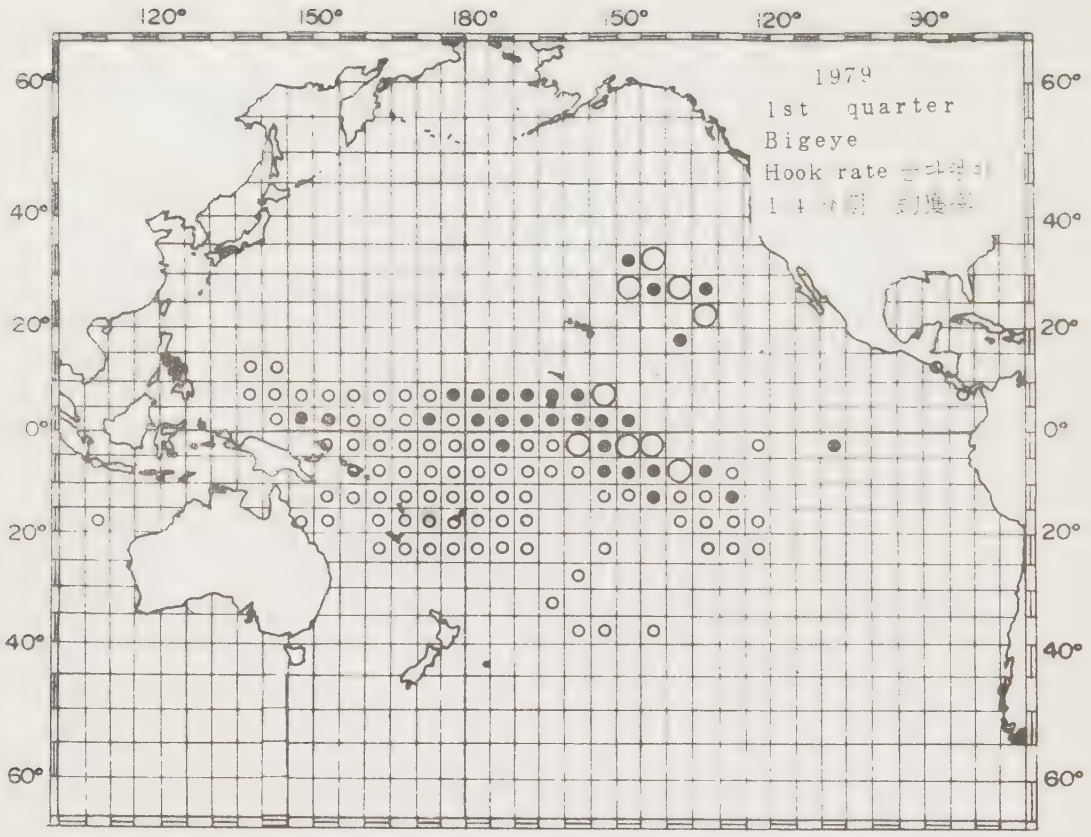
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Nov.
Yellowfin
Hook rate 11月
황다랑이 釣獲率

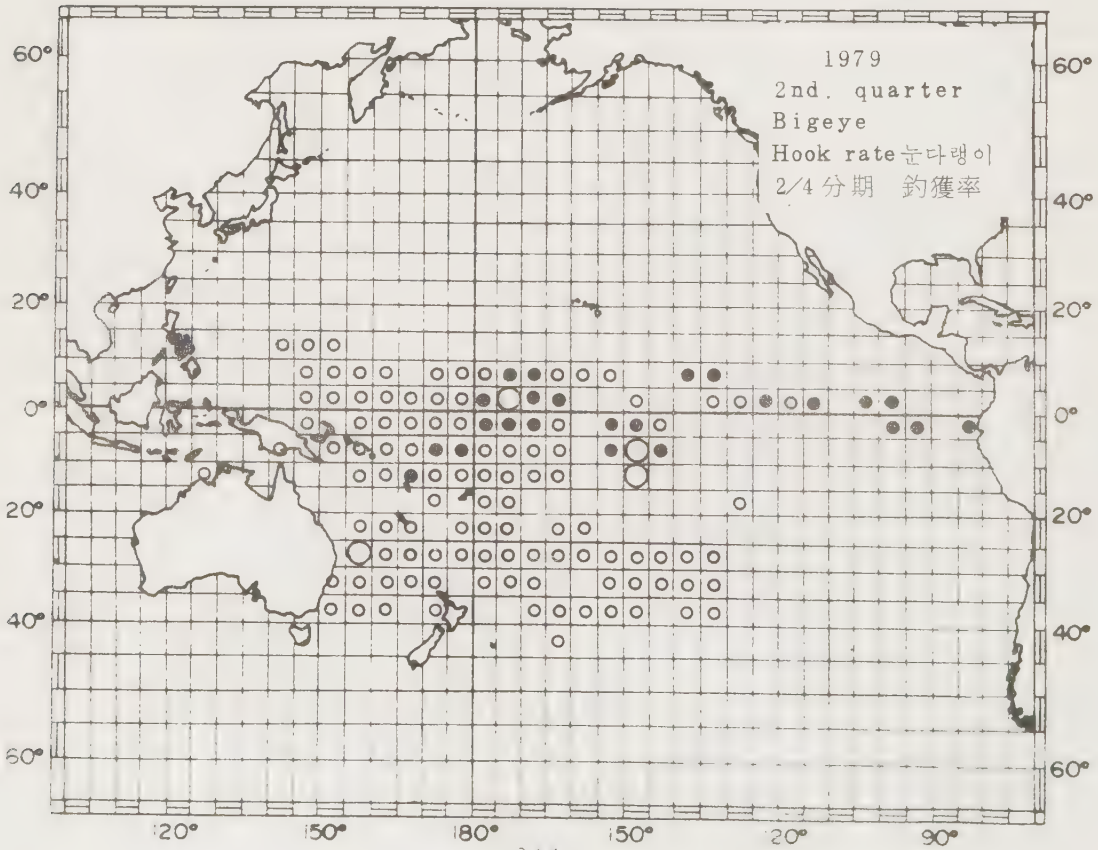

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Dec.
Yellowfin
Hook rate 12月
황다랑이 釣獲率

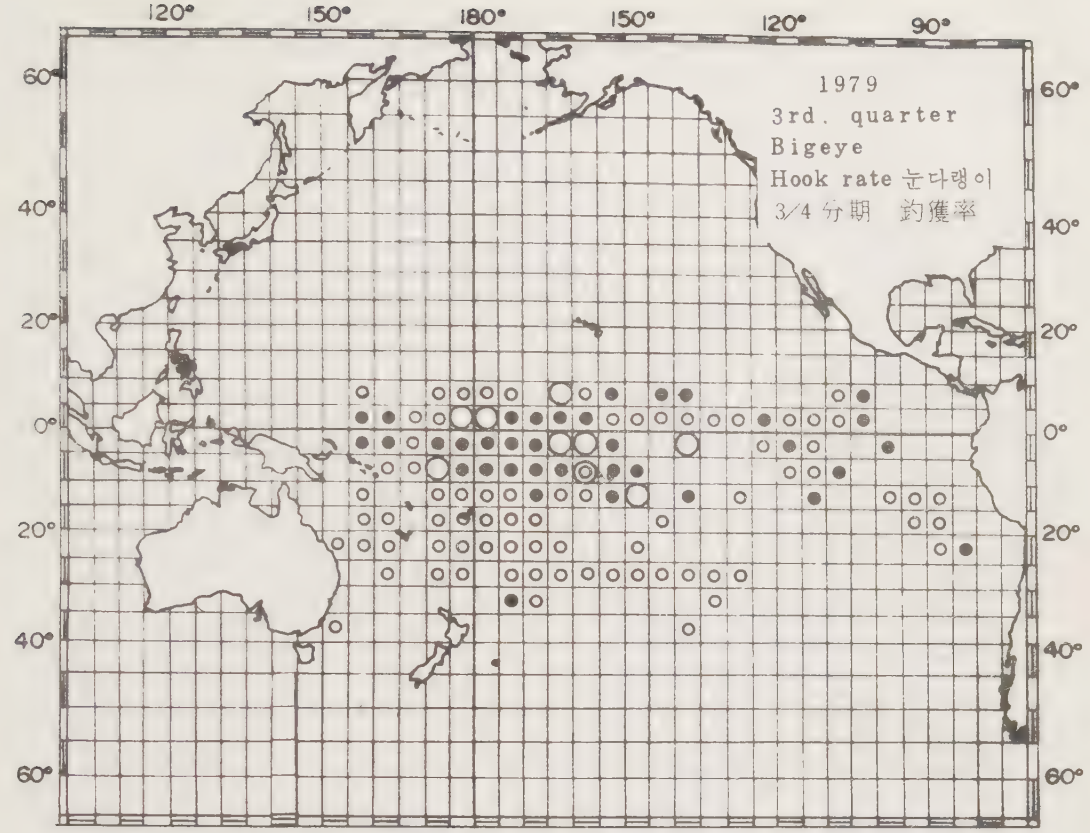
눈 다 랭 이
Bigeye

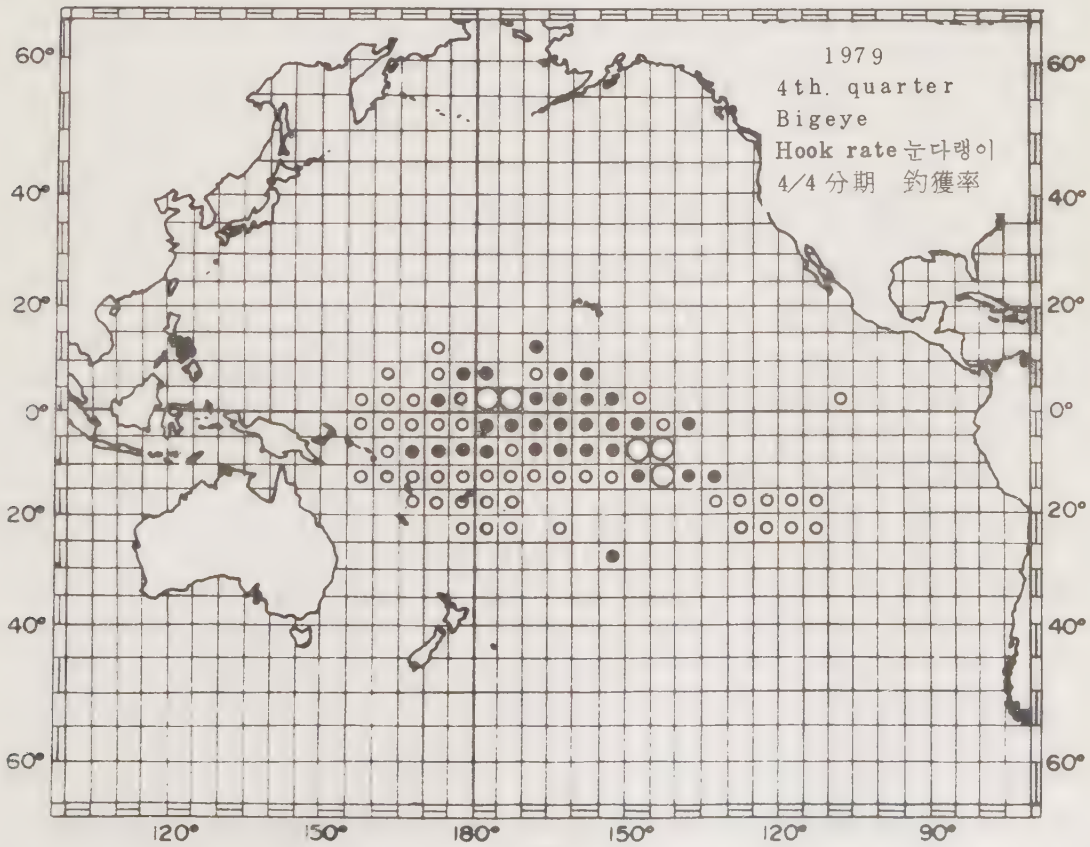

120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
Jan.- Dec.
Bigeye
Hook rate
눈다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
Jan.- Dec.
Bigeye
No. of hooks used
눈다랑이 努力量


1979
1st quarter
Bigeye
Hook rate 눈다랑이
1 4 分期 釣獲率


1979
2nd. quarter
Bigeye
Hook rate눈다랑이
2/4 分期 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979
3rd. quarter
Bigeye
Hook rate 눈다랑이
3/4 分期 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
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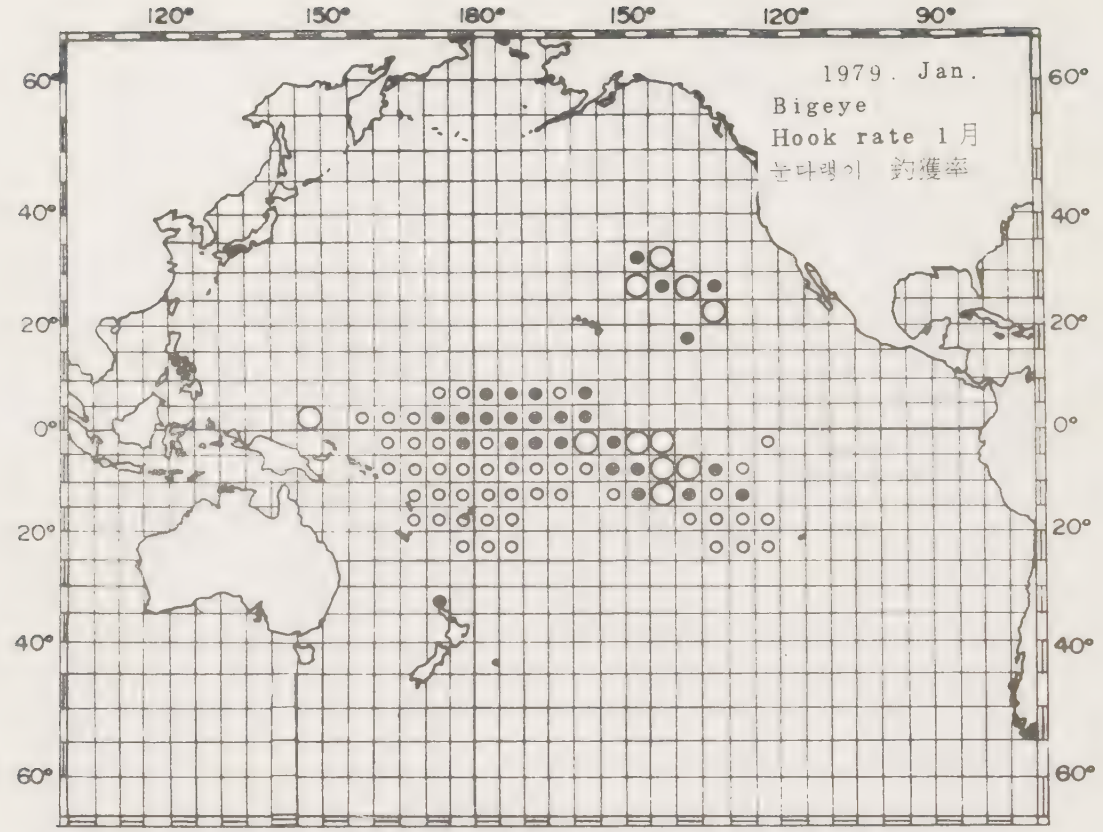
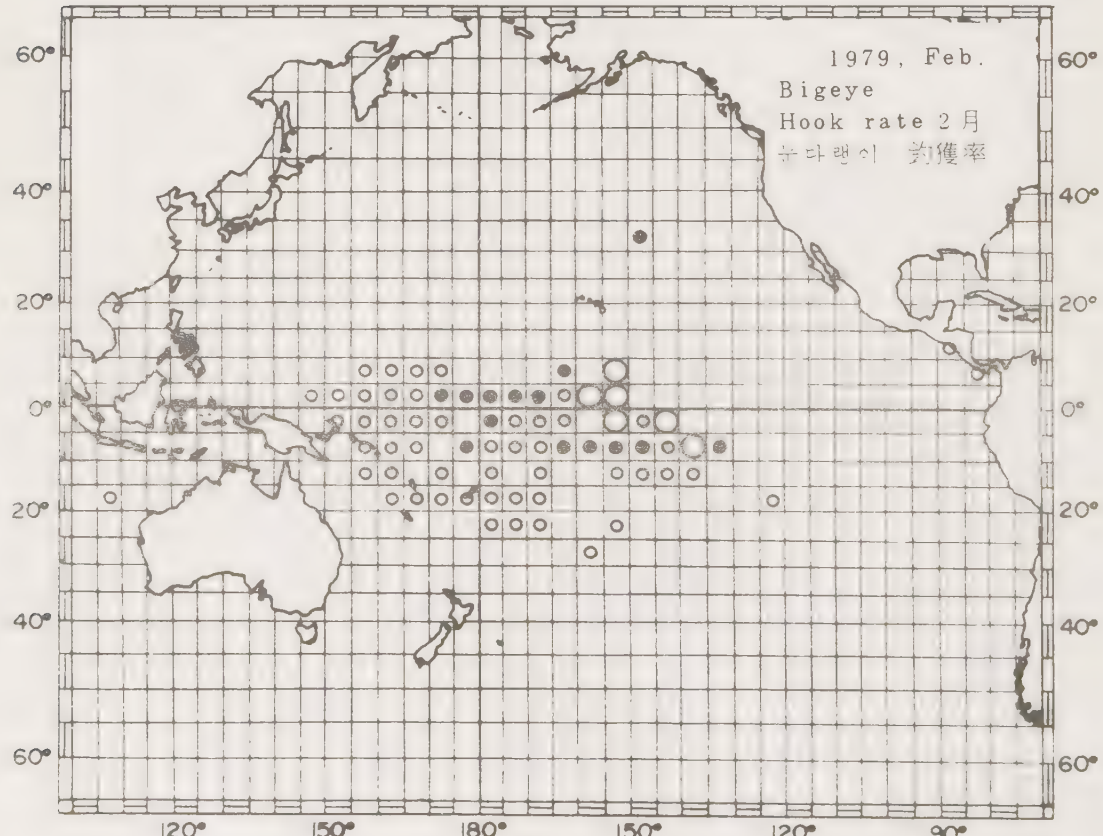
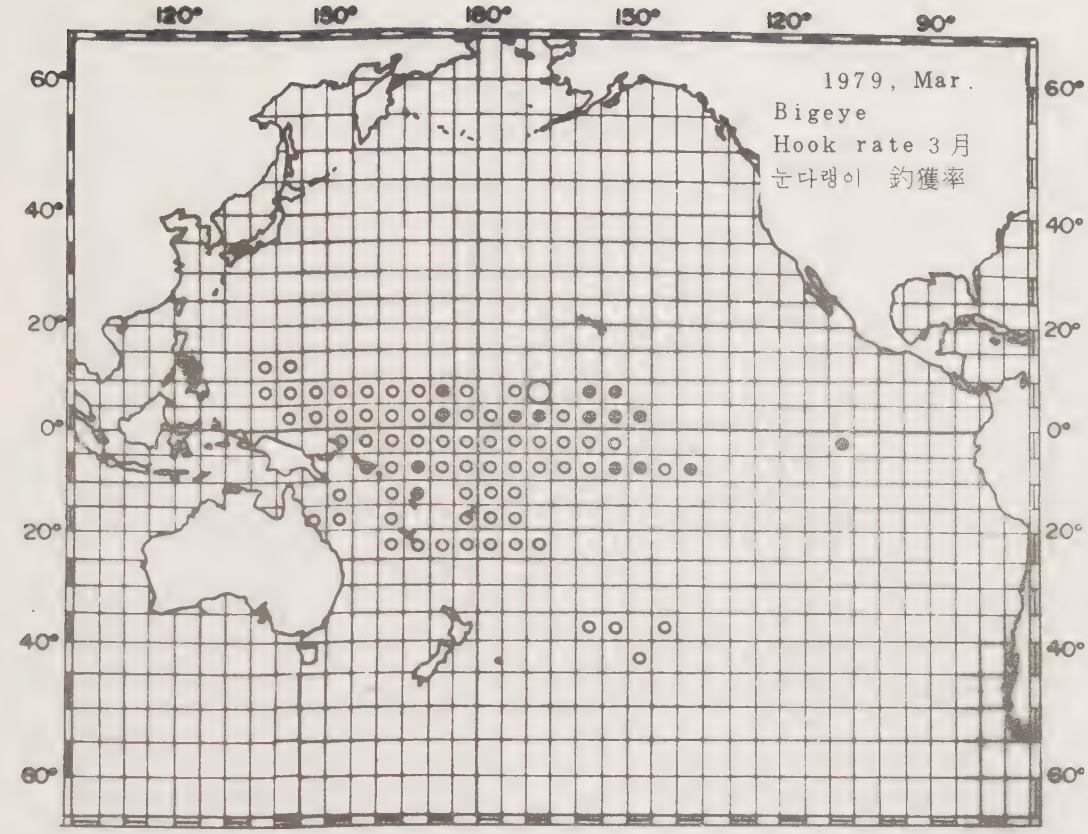
0°
20°
40°
60°
1979
4th. quarter
Bigeye
Hook rate 눈다랑이
4/4 分期 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979. Jan.
Bigeye
Hook rate 1月
눈다랑이 釣獲率


120°
150°
180°
150°
120°
90°
60°
40°
20°
0°
20°
40°
60°
1979, Feb.
Bigeye
Hook rate 2月
눈다랑이 釣獲率


120°
150°
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120°
90°
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20°
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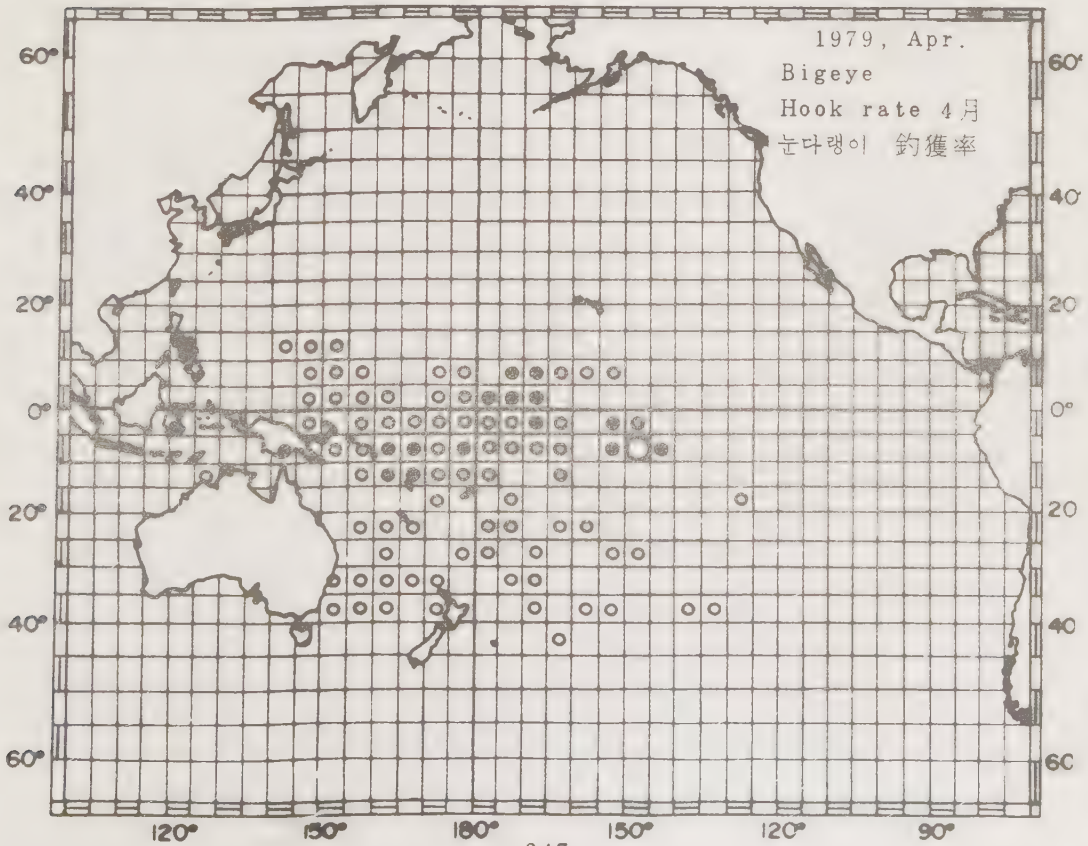
60°
1979, Mar.
Bigeye
Hook rate 3月
눈다랑이 釣獲率


120°
150°
180°
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90°
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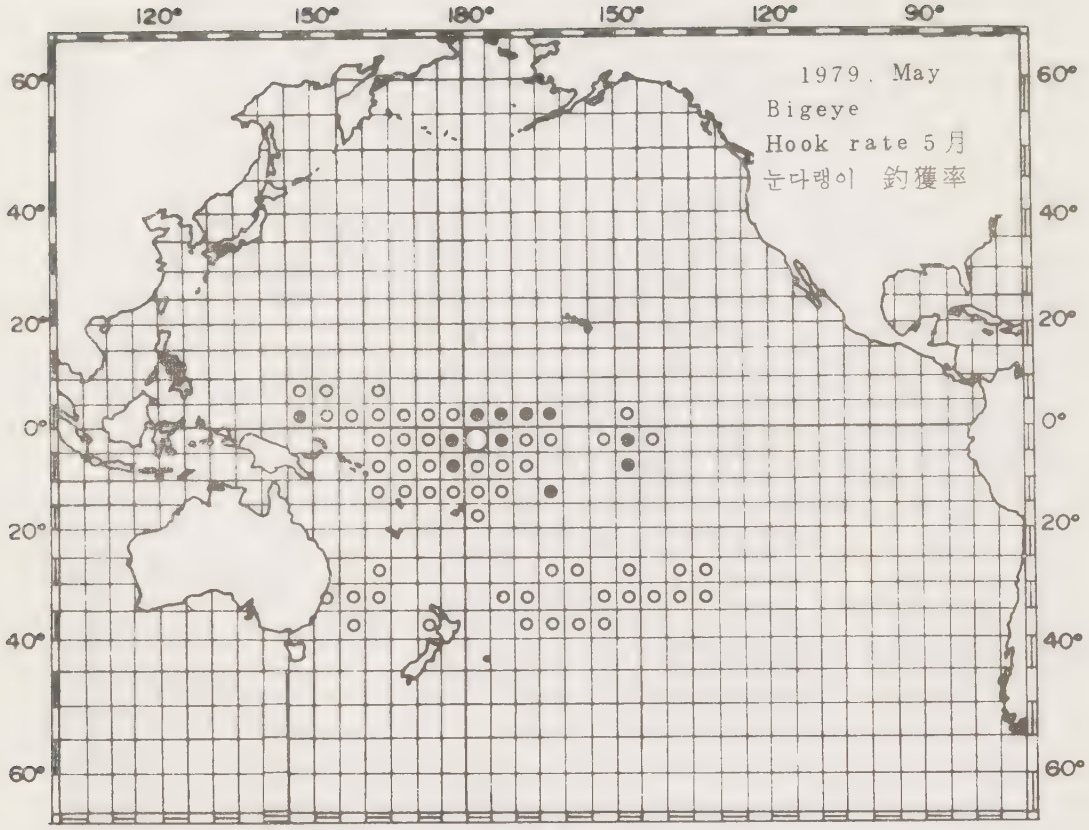
20°
0°
20°
40°
60°
1979, Apr.
Bigeye
Hook rate 4月
눈다랑이 釣獲率


1979. May
Bigeye
Hook rate 5月
눈다랑이 釣獲率
120°
150°
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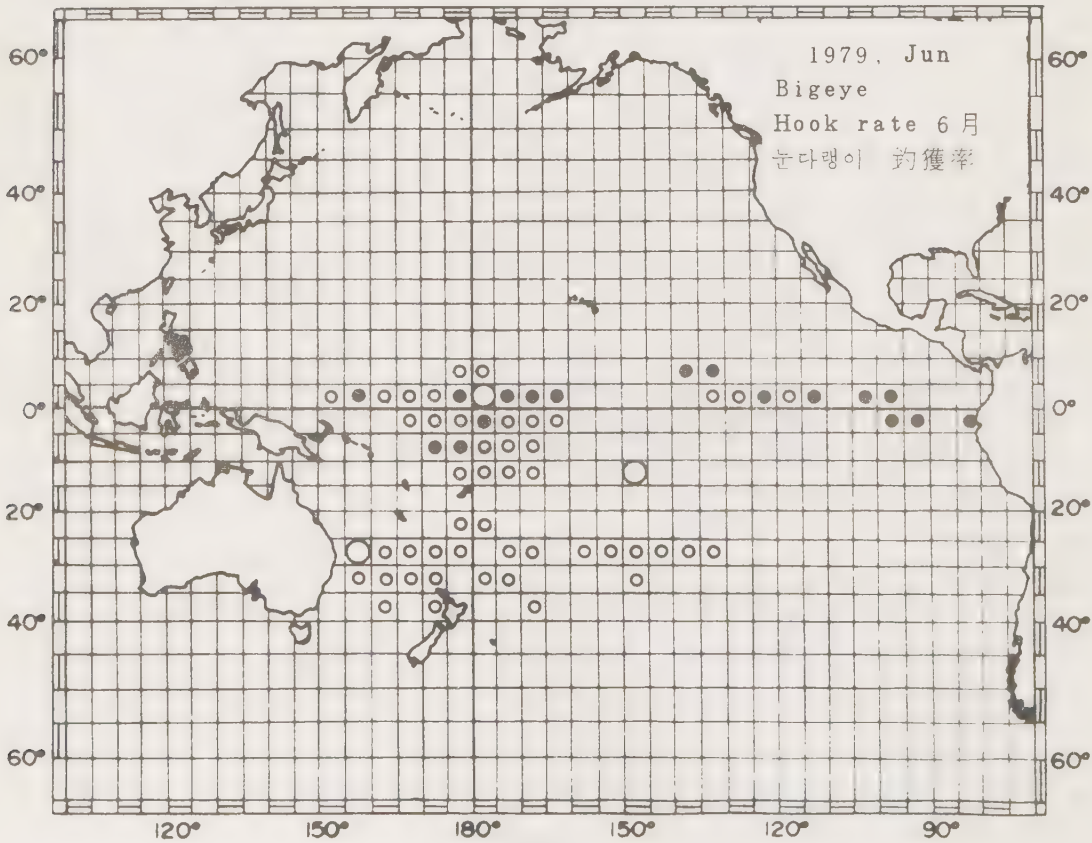
1979. Jun
Bigeye
Hook rate 6月
눈다랑이 釣獲率
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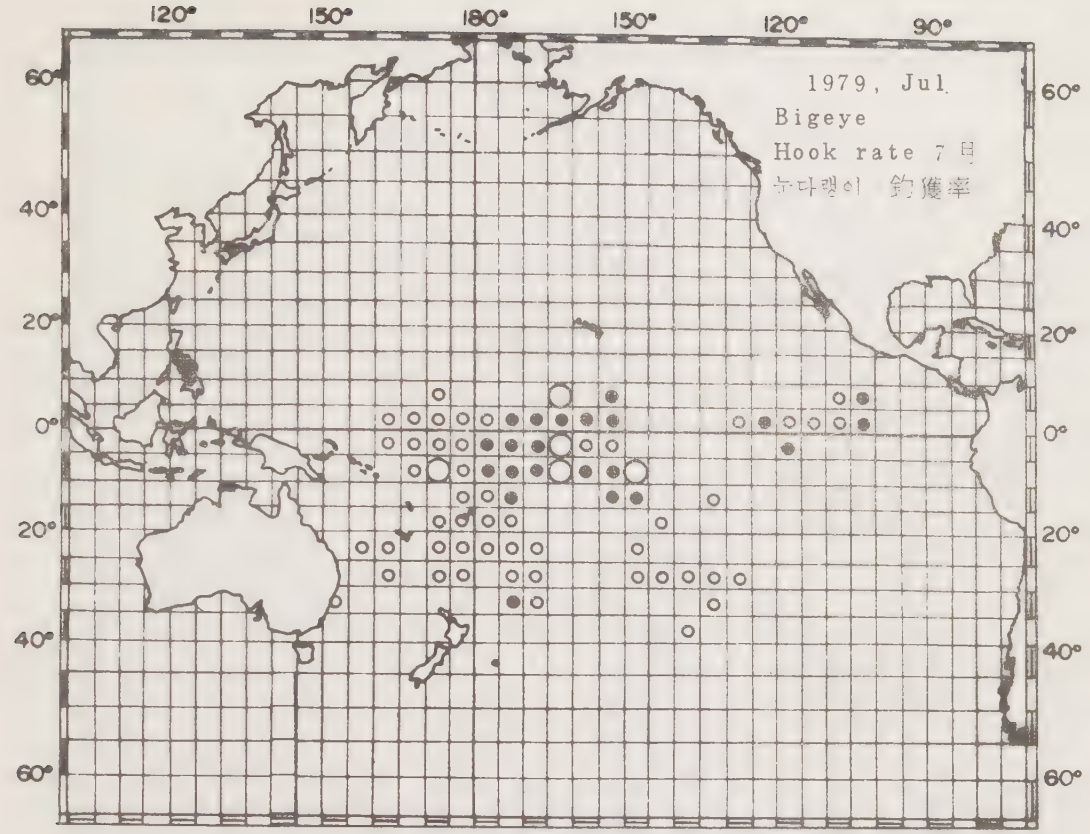
120°
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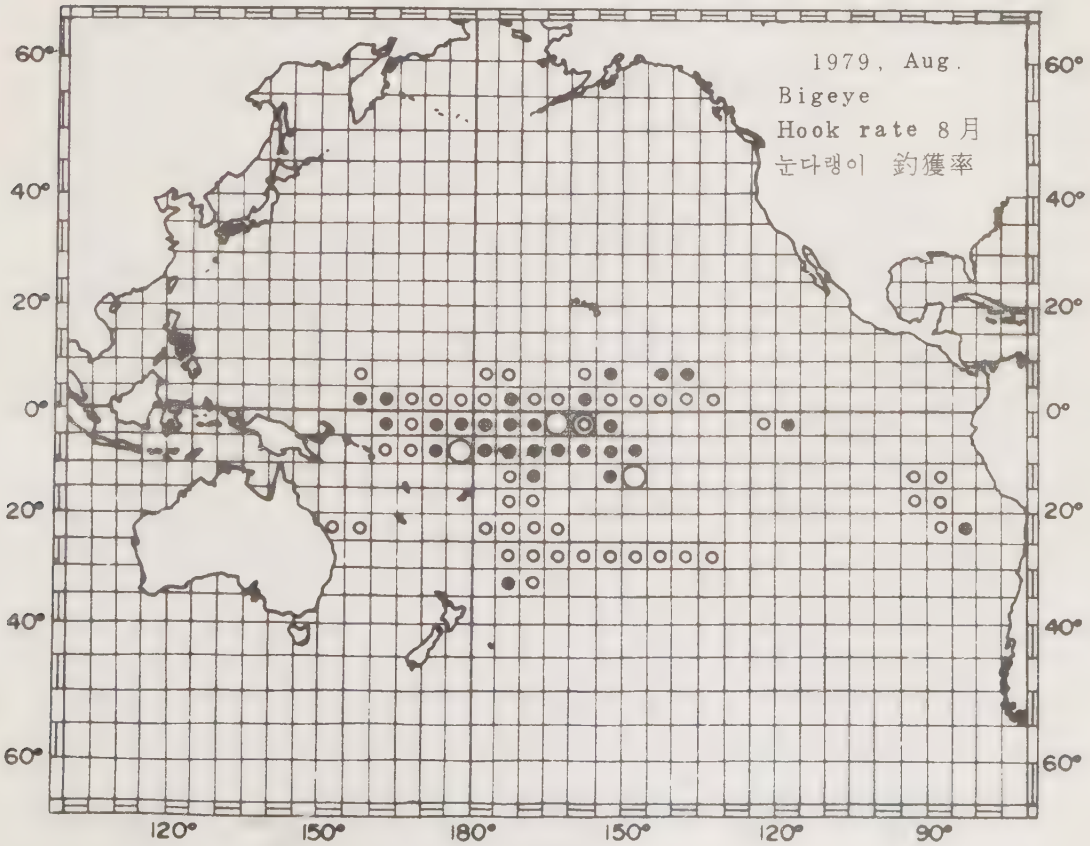
60°
1979, Jul.
Bigeye
Hook rate 7月
눈다랑이 釣獲率


120°
150°
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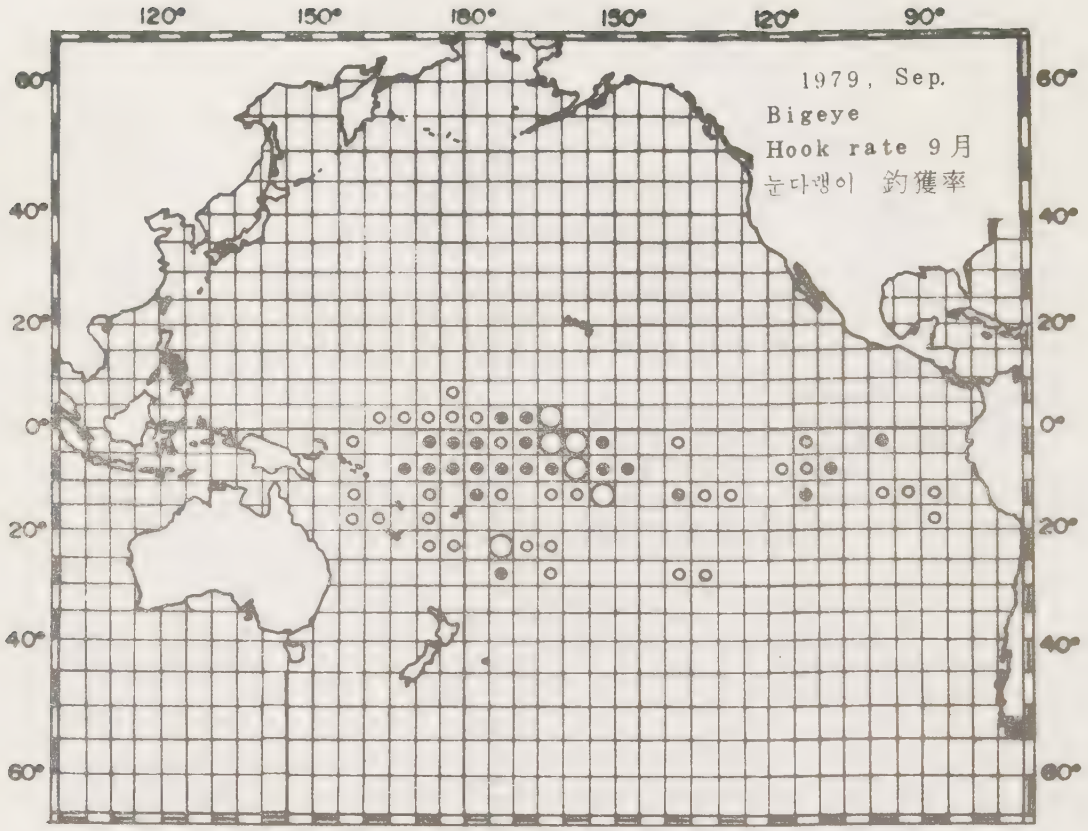
60°
1979, Aug.
Bigeye
Hook rate 8月
눈다랑이 釣獲率


120°
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90°
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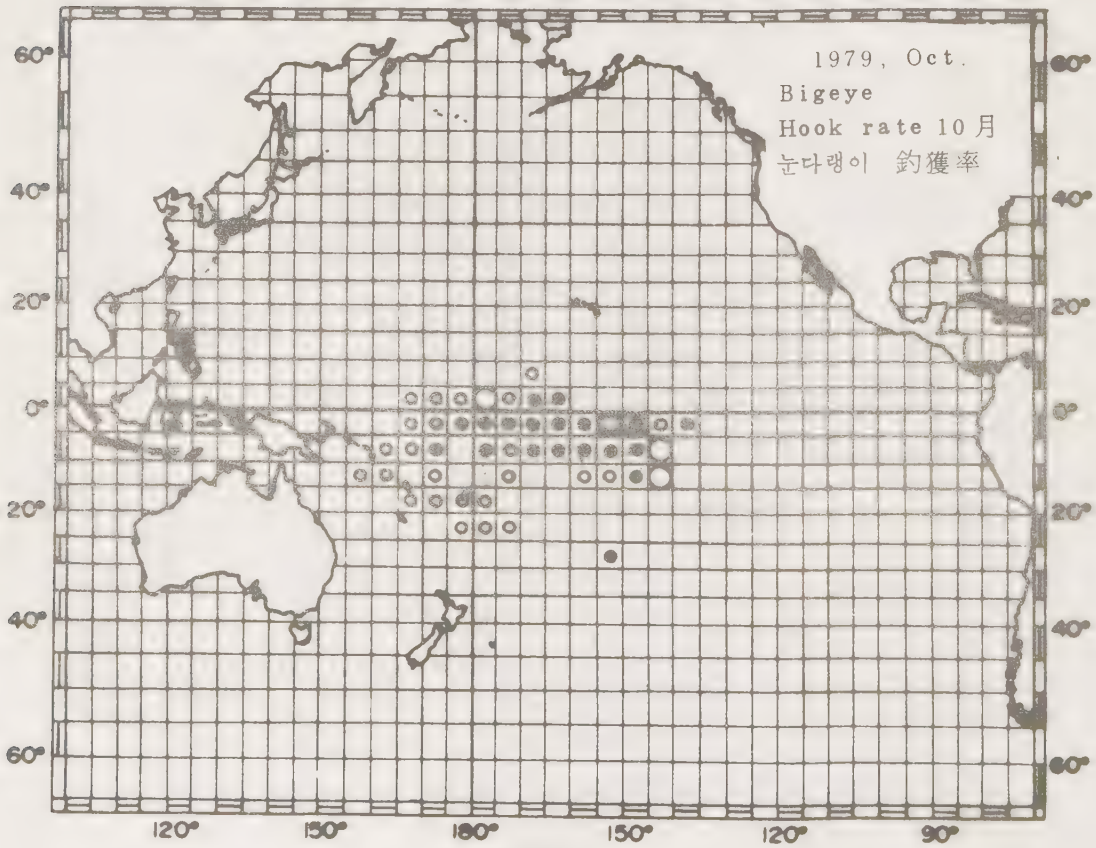
60°
1979, Sep.
Bigeye
Hook rate 9月
눈다랑이 釣獲率


120°
150°
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150°
120°
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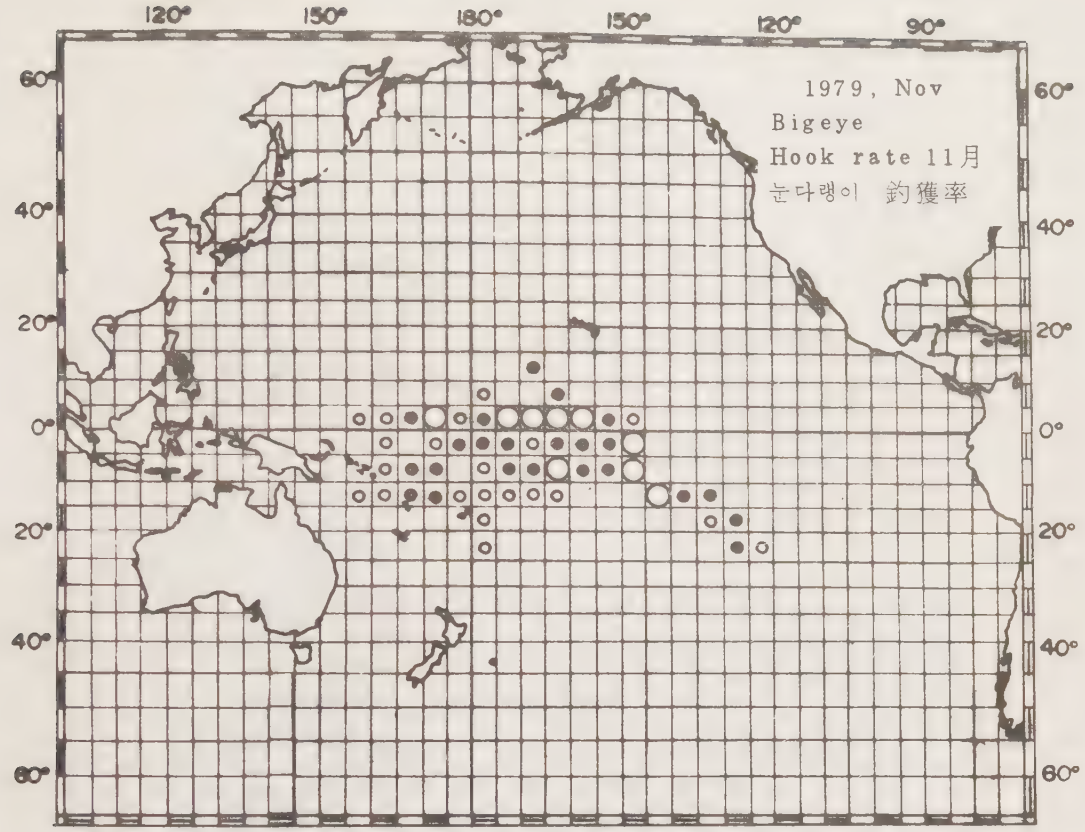
60°
1979, Oct.
Bigeye
Hook rate 10月
눈다랑이 釣獲率


120°
150°
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90°
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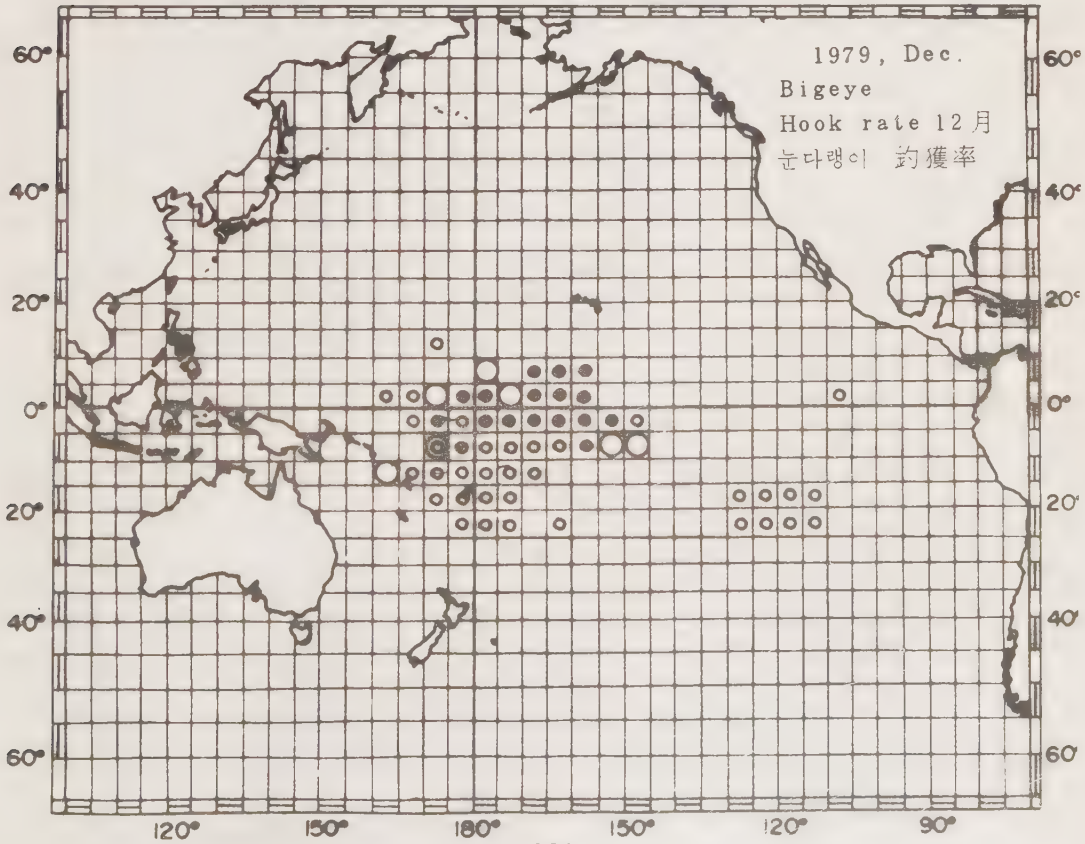
1979, Nov
Bigeye
Hook rate 11月
눈다랑이 釣獲率


120°
150°
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150°
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90°
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40°
60°
1979, Dec.
Bigeye
Hook rate 12月
눈다랑이 釣獲率

遠洋 다랑어 延繩漁業 漁獲統計
資料集 및 漁場圖

ANNUAL REPORT OF CATCH AND EFFORT STATISTICS AND FISHING GROUNDS ON KOREAN TUNA LONGLINE FISHRY

1981 年 12 月 日 印 刷

1981 年 12 月 日 發 行

編輯兼發行人 : 國立水產振興院

印 刷 : 藝 文 社
(44)3331,3192